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A

POPULAR TREATISE

ON

MEDICAL PHILOSOPHY;

OR,

AN EXPOSITION OF QUACKERY

AND

IMPOSTURE IN MEDICINE.

(Read before the Phi Beta Kappa Society of Union College, at its Anniversary Meeting, and, in conformity with a Resolution, published as a part of its Transactions.)

BY CALEB TICKNOR, M. D.
AUTHOR OF "THE PHILOSOPHY OF LIVING."
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To his two distinguished friends, Dr. Joslin of this city, for several years Professor in Union College, and late President of the Phi Beta Kappa Society, and the Rev. Prof. Reed of Union College, the author is under no small obligation; to the former for reading portions of the following Treatise before the Phi Beta Kappa Society, and to the latter for a copy of the resolution below.

Resolved, That the Treatise of Dr. Caleb Ticknor, be deposited in the Archives of this Society, and published in its Transactions.

New York Alpha of the Phi Beta Kappa,
Anniversary Meeting, July 25, 1837.

ATTEST, EDWARD SAVAGE, *Rec. Sec.*

DEDICATION.

TO HIS

BRETHREN OF THE MEDICAL PROFESSION,

AND

TO ALL OTHERS,

WHO PREFER TRUTH TO ERROR,

AND

SCIENCE TO EMPIRICISM,

THESE PAGES ARE

RESPECTFULLY INSCRIBED, BY

THE AUTHOR

TO THE READER.

The object of the following pages is to overthrow quackery in medicine, by exposing its errors, its false pretensions, and its unjust claims upon the community for support. The only way to eradicate error is to plant the germ of truth; and this the author has attempted, by presenting to the public, in this volume, the elements of medical science. He has however traversed but a small part of the territory which his subject embraces; but he flatters himself that he has gone over sufficient to convince the reader that, to ensure success in the treatment of disease, all the accumulated skill and science of past ages is absolutely indispensable.

This volume does not profess to teach every man to be his own doctor; but, on the contrary, it aims to show that, to cure disease, something more is requisite than a dose of patent medicine, whether it comes in the form of pills, powders, syrups, steam, or natural bonesetters, or any other *natural* character.

The anatomical descriptions in this work are such as we have, generally, condensed from Meckel's Anatomy, translated by our friend Dr. Doane of this city ; to whom the profession is indebted for the translation of many excellent works.

With a sincere desire to contribute to the welfare of the community, as well as to advance the honor and dignity of that profession to which the author belongs, he submits the present volume, with all its imperfections, to the perusal of the public.

Chambers Street, *May*, 1838.

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MEDICAL PHILOSOPHY.

CHAPTER I.

THE ORIGIN OF MEDICINE — ITS EARLY HISTORY — CONFINED TO PRIESTS — EMPIRICISM — IGNORANCE, &c. &c.

The records of history do not furnish us with the precise time when medicine was first applied to the alleviation of the pains, and ills, of life; but it is probable that observation and reflection, called into requisition by necessity — the mother of invention — suggested something as a remedy for external injuries, or for internal disease. Experiment, thus commenced, would be repeated, and varied; the good results remembered, the facts communicated, and experimental, practical medicine would begin its existence. However the art of Healing may have originated, we can trace it, by authentic testimony, to the ancient Egyptians; and, as in those early ages, the priests of the temples were the depositaries of all learning, so with them was lodged, in all probability, all knowledge of medicine. The remedies they employed consisted mostly of magical incantations, and such other means as were calculated to affect the imagination of the superstitious

and ignorant. It is supposed, from what scanty records can be obtained, that the contemporary nations derived a knowledge of medicine, with the other arts and sciences, from Egypt; and, from the same data, we are led to conclude that the priests were the practitioners of physic—that their ostensible remedies were chiefly incantations and magic, and that they were so applied as to impress all who witnessed them with a belief in the supernatural power of the priests. Thus every thing was enveloped in a thick cloud of mystery, or addressed to the imagination, hopes, or fears of the patient. The practice of medicine, in those remote ages, bears a close resemblance to that which is common among the untamed Indians of our western wilds. They have their priests who are also their physicians. And, arrayed in a most grotesque manner in the skins of beasts, they perform their round of antics over the dying patient. This is not altogether inert practice, for, not unfrequently when confidence is reposed in the "medicine man," as he is called by them, hope is inspired in the breast of the almost dying warrior, the flickering flame is rekindled, and the voice that was sunk even beneath a whisper, is made again able to make the forests reëcho with the horrid war-whoop.

With other nations, Greece also obtained her knowledge of the arts and sciences from Egypt; and as was formerly our custom, and is yet, to go to Europe for our medical education, so Greece sent her students to Egypt to acquire such a knowledge of medicine as was then to be obtained. The first Greek doctor, whose name has been transmitted to us, was Chiron the centaur, a prince of Thessaly, who lived about the thirteenth century before the Christian era.

Æsculapius, the pupil of Chiron, was the first who made medicine a distinct pursuit, or profession. Divine honors were paid to him, temples were erected, in which he was worshipped as the god of Physic. His sons, Machaon and Podalirius, inherited their father's profession, as was the custom in that age, and accompanied Agamemnon in his expedition against Troy.

The practice of medicine continued for a long time in the family of Æsculapius; his descendants were called Asclepiadae, and officiated as priests in his temples. These temples became a species of hospitals, to which invalids resorted in great numbers, where they were subjected to certain rites and ceremonies; and these, with some dietetic regulations, such as ablutions, and abstinence from certain kinds of food, constituted the chief remedial means employed. It was a custom of the invalids, when they left the temples, to make a deposite of a votive tablet, on which was inscribed the principal symptoms of their disease, and the remedies used in its cure; and it is believed that Hippocrates profited not a little by gleaning from these meagre records.

Many centuries elapsed during which the practice of medicine was confined to the priesthood, and exercised by them for the sake of emolument, or for the purpose of retaining their influence over the minds of the ignorant and superstitious. But in the sixth century before the Christian era the germ of true philosophy, an antagonist power to priestcraft and imposture, began to unfold itself in Greece; and as the former struck root, and spread forth its branches, the latter, deprived of sustenance, felt its giant strength become weakened. A su-

perstructure, once undermined, must fall into ruins: thus it was with the power of the heathen priesthood. Its hold relaxed, its grasp became less firm as the people exercised for themselves the reasoning faculties that their Creator bestowed upon them.

From the age of Pythagoras to the present day there may be traced in Medicine a progressive improvement, although at one time it may have remained for a considerable period stationary, and at another it may have met with temporary obstruction. Its light became dim and obscure during the middle and dark ages, when it fell again into the hands of priests, though of another character; but with the restoration of letters and science it beamed forth with mid-day effulgence, imparting health and comfort to suffering humanity.

About the ~~three hundredth~~ third century before the christian era there occurred the great schism in medicine—the division into the two rival sects of Dogmatists and Empirics; since that time theory after theory, system after system, has been constructed, warmly praised by their friends, and denounced and repudiated by their enemies. Some systems have indeed enjoyed almost universal favor, and seemed to have arrived at a great degree of perfection; when some new luminary has arisen to attract the gaze of the world, and all others have sunk into oblivion. Such have been, for two thousand years, the revolutions of medicine; and yet, the science has been constantly improving. Such, in a degree, will probably continue to be its revolutions, at least while there are visionaries and enthusiasts to wander into some new field of speculation—some unknown coun-

try;—and while there are those who will forsake the well known paths of common sense, and follow in their eccentric course.

The term Empiric did not originally convey the same meaning that it does now. It was applied to those who believed that the practice of medicine was based upon experience alone, and that a knowledge of anatomy, or physiology, was not necessary to the successful treatment of disease. The dogmatists held a contrary opinion, and believed that a knowledge of the structure and functions of all parts of the body was indispensable, as well as a knowledge of the operations of medicine in the healthy and diseased state. The term empiric is, in modern times, applied to those who administer or vend secret remedies, nostrums, patent medicines, and the like, or to those who administer the same remedy for the cure of all diseases. Quackery, empiricism, and charlatanry, are used synonymously; they are terms perfectly well understood by the community generally, and by none better than those to whom they of right belong, and by those who have unfortunately been their dupes. These terms will be used as synonymous in the following pages; and as empiric was once employed to denote experience, quacks sometimes try to shake off the infamy which attaches to them, by saying that all are more or less empirics, because all practise upon experience. But this subterfuge cannot avail. Call himself by what name he will, a quack is still a quack—and even if the prince of darkness should assume the garb of heavenly innocence, the cloven foot would still betray the real personage.

It is not my purpose to discuss here sectarian divisions in the ranks of the profession; my object is rather to deal with bold quackery, and unblushing quacks, who not only procure a subsistence, but even accumulate fortunes by a species of piracy committed under a flag that ought not to be so disgraced. One who is not well acquainted with this subject would be incredulous in regard to the extent and prevalence of quackery in this enlightened age. He would hardly believe that every country village, if it has not one empiric at least, has nevertheless a place for vending all kinds of nostrums and specifics for all kinds of diseases; and he would be still less inclined to believe a true statement of the amount of money received by some of the proprietors of patent medicines. It matters little what the remedy may be, or what the disease for which it is recommended; certificates of cure are always procured, the medicine is sold and swallowed, and the people are gulled.

In ancient times, when the people were groping their way in the darkness of ignorance and superstition, it is not to be wondered at that they should be deceived by false appearances, by mystery, magic, and incantation—, and by the various arts and devices of a cunning priesthood; but it is most truly astonishing, that, with all the light of the nineteenth century, people should be so impudently cheated, when the imposture is so easily detected. It is neither the ignorant nor the superstitious alone who are gulled by the designing; for in this country such individuals are rarely to be found—and yet there are plenty of subjects upon whom these harpies prey. And who are they? They are not ignorant in matters

not pertaining to themselves; they are, by no means superstitious, or particularly credulous on other subjects to which they give their attention. But of the structure of their own bodies, the laws which govern their actions in health and disease, and the causes which derange their operations, they have no correct idea; they have never, perhaps, seen a human skeleton, and, in all probability, ninety-nine in a hundred of the non-professional public, have never even seen a single human bone. They know not how the circulation of the blood is performed, in what vessels it runs its course, nor what will hasten or retard its celerity; they know not the difference between a muscle and a nerve—a tendon and a vein; and those who pride themselves on their extensive acquirements, daily betray the grossest ignorance when speaking of the human system. These are the persons who are the dupes of quacks; and they fall a prey to their arts, not from a general lack of information, but for a want of it in regard to that in which they are most deeply concerned—their health and comfort. Were the positively ignorant the only supporters of quacks, they would soon be driven from the field by starvation; but unfortunately for the interests of science, the universal ignorance of the human system in health and in disease, propagates a race of unprincipled empirics; and on this ignorance they grow and fatten. Encouraged by success, it matters little how gross the absurdity, or how glaring the imposture, they attempt to practice; and if they envelope their whole scheme in as deep a mystery as that which involved the oracles of Pythian Apollo, so much the more

likely are they to become equally celebrated. The history of the last half century will convince any one tha there is no absurdity so great but what will be believed; no visionary in politics, religion, or philosophy, who will not gain proselytes. The German Prince Hohenloe professed to be able to cure disease at a given time by means of prayer. He was resorted to by thousands from all parts of Europe, and for aught I know, from America; and he not only cured those who flocked to him, but he cured others, equally well, hundreds of miles distant, at a time agreed upon by himself and the patient. Charms and magic have not been banished by the increase and diffusion of knowledge; we often hear of diseases being cured by the seventh son, by touch, by saying some hocus-pocus, or by doing some other equally silly thing. To cure warts, you must do sundry things of which every body has heard, and no one has seen beneficial; to cure epilepsy, a bone from a particular part of a Fox is worn around the neck; a strip of eel skin worn around the arm cures a numbness of the hands; a red string worn around the neck prevents nosebleed; a black one causes the teeth of a young child to cut through the gum without pain; and multitudes of remedies, equally ridiculous, are believed to be efficacious by many who are foolish enough to employ them.

There can be no good reason assigned for this general ignorance in regard to the human system, or why it should continue to exist. It is not necessary that every man should have a thorough knowledge of medical science; but it is important that he should know something of its nature. Knowledge of this sort would enable a man to preserve

his health by avoiding the causes which derange it; and it would be also useful in protecting him from the impositions of quackery. A very minute quantity of information is quite ample for this latter purpose; because it is sufficient to convince—to demonstrate to any reasonable mind, that a still greater quantity is necessary to be successful in combating disease. The non-professional public is to blame in a great measure for its own ignorance; although the eagerness with which popular works on health have of late been sought for and read, give indication that we may hope to see this fault removed. Medical men are not entirely free from blame in the discharge of their duty. Having too high a sense of honor, and the dignity of his profession, to resort to the same meanness and falsehood, to counteract imposture, that the quack does to propagate it, the latter, by his assurance and plausibility, succeeds in insinuating himself into the confidence of the unsuspecting; while the high-minded physician, perhaps disgusted with the credulity, or gullibility, of the multitude, is willing they should suffer, and gain wisdom by sad experience. Inasmuch, then, as there is a common responsibility and obligation upon the people and the medical profession, both should honestly attempt the discharge of their duty. To keep a delicate, complicated piece of machinery in order, it is not necessary that a man should be able to construct, or even to repair it, when deranged or broken—he may be acquainted with all the wheels and springs, and all its intricacies, and yet have not skill sufficient to make or mend one of them. But the knowledge he does possess would satisfy him that to employ one less skillful, less

knowing than himself, to repair his machinery, would savour too much of madness or folly. A general knowledge of the structure of the human system, and of the principles of Physiology, with the difficulties of practice, can be attained with no great sacrifice of time or labor; and if no other good results from this knowledge than the ability to choose a skillful physician, when one is needed, the sacrifice, whatever it may be, has not been too great.

The curiosity of man, and his eager desire for novelty, will lead him to brave the dangers of the ocean,—to risk storm and shipwreck; it will impel him on to seek adventures in foreign lands, to explore unknown climes, to wander among savages, and it forbids him to leave any ruin of antiquity unsurveyed, or any ancient battle field unvisited. He treads in the footsteps of heroes of olden time, he breathes the atmosphere they breathed, views the scenery they loved to look upon; and he feels his spirit kindle with a holy enthusiasm as he makes his pilgrimage to those regions which were once visited by the Saviour of the world, and contemplates those scenes in which he was so conspicuous. A fragment of rock from an old and almost forgotten castle, a twig from a tree over the grave of some long buried great one, or any memento of a like kind, is valued as above price. This may all be well enough. Far be it from me to undervalue the pleasure and benefits of travel; but while we are searching after curiosities and novelties in far off and unknown lands, we might find things quite as curious and novel nearer home,—even in our own bodies. We shall there see a piece of

mechanism far surpassing the ingenuity and invention of man. Even in the minutest part, we shall find organs of a complex and different character, performing different functions, and each harmonizing with the other, and all operating by fixed and regular laws. In short we shall behold the last, and the most perfect work of God —the master-piece of an Almighty hand. Judging from appearances, we should conclude that the human body is not always regarded with indifference; the care that is taken to display its form, the study shown in decking it with finery, and in arraying it in the extreme of fashion, give evidence that our mortal bodies are valued, by no means at a low rate; and, yet, however exalted our self-esteem may be, all that we know of the tenement which we inhabit, is, that it is something very pretty—very much to be admired, and with it we have no further concern than to ornament and garnish it, as fashion or fancy dictates. The absolute ignorance of most people, of the human structure, is really lamentable: many suppose that the brain is about as large as a tea-cup—that the lungs may be of the same, or any other size; and they are quite as likely to transpose the organs—locating the stomach in the chest, and the lungs in the abdomen—as to give to each its own "local habitation."

For this ignorance, I again repeat, physicians are in part to blame. They have not taken pains, and adopted a right course, to spread information among the community at large. Were it otherwise—had people but a knowledge of general anatomy, as well as the principles of physiology, and the nature of disease, they would be enabled rightly to appreciate the pretensions

of quackery, and the claims of the scientific physician—to discriminate between the genuine, and the counterfeit, coin. Every practical physician had much rather prescribe for one enlightened on the subject in question, than for one who is not.

Anatomy and physiology should constitute one of the branches of study in all the higher seminaries of learning. And I am most happy in here stating that my worthy, and distinguished friend, Prof. Joslin, late of Union College, Schenectady, was the first to introduce this study into a regular collegiate course, and has, for several years past, pursued this plan with entire success, and satisfaction to his pupils. If Dr. Joslin's plan could be adopted in other colleges, a tone would, ere long, be given to public sentiment, that could not fail, eventually, to lead to most pleasing and useful results.

But before so desirable an object can be attained, an inveterate, and almost universal popular prejudice must be removed. I allude to the strong feeling against the dissection of the human body. In ancient times, it was the popular belief that the soul was doomed to wander about restless and unhappy, and unable to cross the river Styx to reach its final abode, while the body should remain unburied; and hence it was deemed a pious obligation that the dead should be interred as soon as circumstances would permit; besides, every one who desired the peace of his own soul when its separation from the body should occur, would be prompt in setting an example to those whose duty it would become to dispose of his remains. Thus it was next to impossible that human dissections should have been made; and hence it

was that the earlier anatomists were compelled to cultivate their infant science by studying the structure of the lower animals, and making such deductions from their discoveries as analogy seemed to warrant. It is not surprising that their facts were few in number and uncertain; that their ideas were limited; their speculations wild; and their amount of knowledge extremely small.

Prejudices have been gradually overcome by the firmness and determined perseverance of the professors and friends of medical science. To a study of the structure of the healthy body by dissections, and to investigations into the changes wrought by disease, by *post mortem* examinations, are we indebted, more than to all other facilities, for the great improvement in the healing art for the last half century. And yet, rapid as have been its strides towards perfection, compared with its former imperceptible, snail-like pace, it is still far behind what it would have been had there not existed legal obstacles to impede its progress. There are in most, if not in all the States, severe penalties annexed to the *crime* (?) of procuring subjects for dissection. Our legislators have, in their wisdom, deemed it expedient to prescribe a certain routine of study for the medical student, as well as to make him liable for all damages for mal-practice, subsequent to the commencement of his professional career. And yet—strange inconsistency, or rather, stupid, wilful ignorance, and blind superstition—they raise a barrier in the only path which leads to the knowledge that would enable him to avoid error. They compel him to make bricks without straw. They extinguish the light, and then punish him for not seeing.

Popular prejudice on this point is so strong that were a doctor, for anatomical purposes, to disinter the vilest wretch—one who had been a scourge to society—a pest to all around him—who had been supported at the public expense, and whom all had been glad to bury—there are those who would raise a cry of alarm, hunt down the doctor, and persecute him to an extreme but little short of death. And little difference would it make whether or not those who make the greatest ado about "violating the grave," have been most benefited by the skill of him whom they seek to punish—they, or some member of their family may have been snatched from the grasp of death by his agency, yet, in their persecution, they are unrelenting.

It is right that one who never did good while living, who was an expense to the community, should be turned to some useful account when dead, by affording the means of instruction to preserve the lives and health of the living. What possible harm can it do to one, who has "shuffled off this mortal coil," to be subjected, for a longer or shorter time, to the knife of the dissector? He will, in any event, become the prey of worms—a mass of putrefaction—and be resolved into his elemental dust. The knife inflicts no pain, and should not the reflection, that good is to result to our species, eradicate the ancient prejudice that may be opposed to this use of our bodies?

Many, perhaps most, believe that it is all selfishness that prompts the doctor to manifest an eagerness to examine the bodies of the dead—that it is solely to accumulate wealth, and acquire fame, that they endeavor to make themselves skilful. Such an imputation, the whole

body of the profession will throw back, with contempt, into the faces of those who make it. And again, others think that doctors are amply remunerated now, and would be glad if their fees could be diminished. Of what value is life? How do such men estimate the value of a wife, a child, or a parent? By dollars and cents, and but few of them? Have they so much the spirit of a miser as to think that medical men feel themselves *paid*, *amply compensated*, by a few dollars more or less, for saving life? We should suppose that they were misers indeed—did not their extravagance in furniture and equipage belie them—when they attempt to chaffer with their physician and beat him down in his fees, when he has spent his days in anxiety, and his nights in watching over their sick couch, and perhaps performed the most menial and disgusting services.* Still there are those who would immure the doctor in a prison, and rob his children of money, to pay a heavy fine, if he but dares to touch the grave of an outcast whom they often repulsed from their doors, refusing him the crumbs that fell from their table.

It is supposed by a great majority of those who exercise power in this country—the sovereign people—that executed criminals furnish an ample supply of subjects for the schools of medicine, and for those engaged in private practice. This erroneous idea is another strong

* It must not be supposed that the author is an advocate for extortion, or exorbitant fees for medical services. There is nothing more difficult than to fix the price for our professional labor—to rightly estimate the value of a skilful physician.

reason why public opinion should be corrected by the only proper means—and that is, such a knowledge of anatomy, as to show the absolute dependence of all medical science, and professional skill, upon anatomy; and to demonstrate, also, the necessity of repeated dissections to preserve the knowledge once acquired, and to enable the surgeon to become dextrous in his operations. Every practical man knows how important it is that a mechanic, or artist, to do justice to his work, must be in the frequent and constant use of his tools and instruments; and that, unless he does so, it is impossible that he should be able to repair any delicate machinery, or to do any thing whatever creditable to himself. How much more important is it, then, that one who attempts to repair the most delicate, most complicated, of all mechanism—the human machine—should possess the adequate skill? And yet, one who does not frequently use the dissecting knife upon the dead body, is in no wise qualified to use the operating knife upon the living.

The demand of subjects for dissection being so great, it is clearly demonstrable that the supply from the gallows is altogether too meagre. Had students and physicians no other means of studying anatomy than such as are afforded by our Oyer and Terminer courts, not one in a hundred would ever see the structure of the human body in a recent subject—where it must be seen to be known.

In places where subjects for dissection are most easily procured, medical science has taken a higher rank, and assumed a more dignified aspect. Of late years, Paris has taken the lead in the cultivation of medicine; and the

sole reason is that there is no lack of facilities for anatomical pursuits. Philadelphia, too, in our own country, stands first and foremost in the ranks of our profession; and it is not because she has more able men, or because she has any superior advantage, save the single one of abundant facilities for anatomical studies. An enlightened, and liberal minded legislative body—whether it was the corporation of Philadelphia, or the State legislature I know not—ordained that every pauper, who was not claimed by some friend within a limited time after death, should be given over to the medical faculty for dissection. This law at first created quite a sensation. But it was soon understood, and appreciated; and it now gives as perfect satisfaction as if every pauper were buried with military honors.

A law very similar to the above was passed by the legislature of Connecticut some few years since; and the author takes some pride to himself from the fact that his brother, a physician, was chiefly instrumental in doing so much for science and humanity. Were all the States to adopt such laws, we should have no more of fines and imprisonment for "robbing the grave"—"body snatching," and the like; and although there might be, at first, some opposition, yet, a little attention would bring people to their senses, and teach them that such a course might be the preservation of their own lives. Besides, it might be the means of allowing their own bodies to rest undisturbed, to mingle with their mother earth; for anatomy *must*, and will, be studied in spite of fire, imprisonment, the stake, and the faggot.

Medical men, particularly of the younger class, and

students, and those of riper years who feel the responsibilities of their profession, will procure subjects at any hazard. This may be taken for granted. Since public opinion is such as it is on this point, it should never be outraged, by selecting the bodies of those, who have a large circle of friends, whose feelings would be lacerated by the exposure. It is natural, it is right, and one of the brightest and best traits in the human character, that affection for the living still fondly clings to the dead; and the fondness with which we dwell on the memory of the departed ought always to be respected and cherished, as one of the blessed influences designed by the Creator to do us good. Sacred may it ever be held!—And may he who wantonly trifles with it—no matter whether it be founded in prejudice or not—be treated with the indignation that his want of sympathy with the afflicted deserves.

But this is not the objection in the case of those who leave no friend with love sufficient to bury them; and who, when living, met with hardly charity enough to keep them from starvation.

The incident below will serve to illustrate the determined perseverance of students, as well as their teachers, to acquire a knowledge of anatomy; and it also serves to show the manner in which an educated, though prejudiced, and miserly individual, may show his hatred of the living, and his regard for the dead. The story may as well be told without names or dates.

A few years since there died, in a country town, one who had for a long time led a dissolute and debauched life, a scourge to the neighborhood, and an eye-sore to all who knew him. During the latter part of his life, he

was supported at the public expense. By one, who called himself a gentleman and Christian, the poor vagabond was not unfrequently, bad as he was, greatly abused. At one time he was thrust into the streets, in the midst of a dark and tempestuous night, at a distance from his own miserable hut; and at another he was refused a drink of water from the well, or a mouthful of food, and threatened with personal chastisement. No one claimed this poor creature as his kinsman; he had not a solitary friend. He was buried like a dog, and totally uncared for. The fact of his death was carried, not much less than twenty miles, by a young physician to others of his acquaintance; and arrangements were immediately entered upon and completed to procure the body. A pair of horses and sleigh were in readiness, the necessary implements procured, and at ten o' clock, when all was quiet, and all fear of being recognized on the road prevented by the lateness of the hour, these three young doctors started on their errand. The wind having blown from a southerly direction for some hours it soon commenced raining; and the snow being thin upon the ground, the issue of their expedition began to appear somewhat doubtful. The rain poured—the sleigh shoes grated harshly upon the gravel—the night was extremely dark; and the faster the rain fell and the snow melted, the more was their speed increased as far as was consistent with safety over a bad road, with which they were but little acquainted. Thus they contended with adverse circumstances till they had accomplished nearly the whole distance; and, now, on looking at what was before them —considering the time necessary to accomplish their

work—and to make the journey home over a road, now almost cleared of snow—it was found impossible to proceed further. So with no little vexation from disappointment they faced about, and retraced their steps, meeting with but one slight accident—an overturn in the mud—on their way home, where they arrived, after making all possible speed, at broad daylight. Two days after this, a second attempt was made. The snow had now entirely disappeared; and those who are acquainted with a New England climate can judge of the state of traveling after a "January thaw," when the ground has been frozen to a considerable depth. Thus it was now, when the devotees to physic set out on their resurrection jaunt in a lumber waggon; but, after proceeding a few miles, were again compelled, by the depth of mud, which prevented their going faster than a walk, to again abandon their enterprise. Not disheartened, though twice disappointed, they started a third time. They now rigged out a heavy lumber waggon, with four stout horses, owned by a teamster, who, with his team was well known in all that region of country; and to make the most of their time, they set out, early in the evening, fully resolved not to return without bringing with them their *subject*. This third attempt proved completely successful; and with making all possible speed, losing not a moment by unnecessary delays, they reached home,—having performed a journey of between thirty and forty miles in a dark night, and accomplishing a fatiguing work to which they were but little accustomed—and had their new friend fairly introduced into his new quarters as the day dawned.

Another burial was to take place in the same yard, and on the day subsequent to which this nocturnal visit was paid; and by some unlucky accident, or from lack of proper caution on the part of the new grave-diggers, something was discovered about the grave that had been disturbed, which led to suspicion that its inhabitant had not reposed in quiet. An examination took place, and the body was found to be missing. A general search was now commenced among the doctors; and foremost in pursuit, and loudest in the cry, was the above named worthy and enlightened gentleman. Unrelenting in his persecution, and fierce as a blood-hound upon the heels of his prey, no obstacle impeded him in seeking for the carcass of that poor creature, at whose death he felt rejoiced. So savage and vindictive was he, that he threatened to have inflicted upon his family physician—the father of a numerous family of children, and who had been a friend and servant to his persecutor for years—the severest penalties of a barbarous law. But his efforts at discovery were fruitless; and after weeks spent in a fatiguing and not very creditable search; after the arrest and examination of half the doctors in the county; and after spending more money than he had ever given, in his whole life, in charity to the living; he gave over the chase, and sneaked home to his kennel, a little wiser than he left it—for he became convinced that he had better leave every one to follow his own profession.

The practice of giving up the bodies of executed criminals for dissection serves only to foster the prejudice already existing; for it constitutes a part of punishment —and the cultivation of science is its execution, and

physicians are the executioners—assistants to the common hangman.

We should think that, inasmuch as our law-givers demand of the regular-bred practitioners of medicine certain qualifications, and compliance with prescribed rules, they would afford some little facility for complying with what is required. But no such thing is done. At any rate they might, with propriety and consistency, allow him the privileges of *legalized quackery*. By the laws of this State, a student is compelled to study three years with some legal practitioner of medicine, to attend one course of lectures at an incorporated medical school, and to pass an examination, by a board of censors; to obtain a license to practise his profession. In addition to this, to obtain a degree, he must have attended two courses of lectures, and sustained an examination by the professors; and all this is done at no trifling expense. The same body of wisdom, the legislature, that prescribes this course, allows any ignoramus to practise medicine —to administer the most active and dangerous remedies—whenever he can find a fool to swallow them. Nay, quackery is protected by law; for the right of administering drugs is secured by patent. He who is too lazy to earn his bread by labor, or too stupid to do it by any occupation that requires intellect, and who is so much of a rogue as to desire to profit by the credulity and ignorance of his fellows, has only to purchase a right for the application of steam, and the administration of lobelia, and cayenne pepper, and he is forthwith transformed into a doctor—he is born Minerva-like, full grown, and completely armed from the brain of this legislative Jupiter.

Is it any wonder then that quackery flourishes when it is guarded, protected, and cherished by legal enactments? Who would not be a quack, at the cheap rate of twenty or thirty dollars for a "right," and the trouble of reading a few pages, rather than sacrifice the time and money necessary to acquire a good medical education? Shame on any enlightened community that tolerates such inconsistencies, such abuses! Abuses to science, to itself, and to posterity.

The members of the profession ought to be untiring in their efforts to inform the public mind, and to give a proper direction to public opinion; and not the profession alone, but all educated men are under obligation to lend a helping hand in effecting a reformation. Legislatures will then do their duty, if they hold their popularity too dear to do it sooner. Pennsylvania and Connecticut have set a noble example; and least of all should it be said that the "Empire State" is a laggard in any cause that has for its aim the good of humanity.

So inveterate is prejudice, or so closely does affection cling to the departed, that it is comparatively rare that physicians are allowed to make post mortem examinations of their patients, even in the most interesting and instructive cases. One, of a family of several children, dies with some obscure disease, and the physician desires to make an examination; but his request is not listened to by the afflicted parents. They are not aware that their other children are likely to be attacked with the same disease, and, therefore, do not see the benefit that may result to the living by an inspection of the bodies of the dead. It is universally the case that the most ignorant

are the most obstinate in their opposition to seeking for the seat of the disease, and the cause of the death of their friends. The bodies of the kings of England have, for centuries, been subjected to examination after death, that the seat of their disease might be ascertained, and the cause of death known and recorded. This custom of the royal family of Great Britain ought to be imitated by the noble and the ignoble in all countries; and *consent* of the surviving friends ought not to be wrung from them, but when the physician is not anxious, they should urge it upon him as a part of his professional duty. The surviving members of a family might in many instances be most signally benefited in one important particular; and that is, in being made acquainted with some hereditary disease as well as the means of obviating its unhappy results.

Were it the general custom for physicians to examine the bodies of their deceased patients, they would be enabled to retain their knowledge of general anatomy, and to become better acquainted with disease, than it is possible for them ever to be without having this opportunity afforded.

CHAPTER II.

GENERAL VIEW OF THE HUMAN BODY AND ITS DIVISIONS.

Sec. I. The human body, like all organic matter, is composed of solids and fluids; but the latter exists in much the greater proportion. The solids of the body are reduced by anatomists to twelve varieties*—bone, cartilage, muscle, ligament, vessel, nerve, ganglion, follicle, gland, membrane, cellular membrane, and viscus; under the latter term are included all the organs in the cavities of the body, as the brain, lungs, liver, stomach, kidneys, etc. These several tissues are again resolved, by chemical analysis, into their constituent elements; as carbon, nitrogen, etc.

The proportions of the solid and fluid parts of the body are not the same at all periods of life; the latter diminishing from the commencement of fœtal existence till the dust returns to dust. According to Richerand, the solids exist in relation to the fluids as one to six—Prof. Chaussier estimates them as one to nine in the adult.

Neither do the solids exist in the same proportion in different individuals. The preponderance given to one organ or another is one cause of the varieties of temperaments; and in this also consists the predisposition of individuals to disease. Even in an individual the same

* Dunglison.

relative proportion between the organs does not uninterruptedly continue; but is modified, almost beyond belief, by diet, occupation, climate, epidemic influences, and a variety of other causes, so that the constitution undergoes almost an entire revolution.

Without adopting any scientific arrangement, it may be sufficient to say that the fluids are divided into blood, chyme, chyle, perspiration, tears, saliva, etc. The proportion of the fluids like that of the solids varies in different, as well as in the same persons; and this also aids in the formation of the temperaments and in the predisposition to disease.

SEC. II. *Health and disease—in what they consist.*

Health consists in a perfect harmony of all the organs of the body, in all their acts and functions, so that each shall be in unison with all the others. Disease consists in the interruption of this concord—this harmonious play of the organs; and since the human system is constantly surrounded by so many causes which tend to its derangement, there are few, comparatively, who may truly be said to enjoy a state of perfect health. Every one, from some particular circumstances, or from some peculiar conformation of his system, may be in the possession of that state which is health to him, but which would be disease in one of a different constitution.

We see plainly manifested the different constitutions, and predispositions to disease, if we observe closely the dissimilar maladies that a single given cause may produce, when a number of individuals are subjected to its influence. Thus twenty persons may be equally exposed to the same extreme degree of cold; one will

have an attack of acute inflammation of the lungs, a second will have pleurisy, a third inflammation of the bowels, a fourth inflammation of the liver; each may have a different disease, and some may escape altogether.

Dr. Good, in his "Study of Medicine," enumerates about four hundred and fifty diseases, or varieties of disease, that affect the human system of both sexes. When we take into consideration the fact that it is but seldom that one organ is alone diseased—but that others are also involved—and when we also have in view the endless variety of individual peculiarities, as well as the causes which produce and modify disease—we shall not be surprised to find, that every case is comparatively a new disease. In this classification Dr. Good does not reckon diseases that come under the head of Surgery; so that if we take them into the account, and bear in mind that no two accidents or injuries happen exactly alike, and rightly estimate also the variously diseased states of the system they involve, we must see clearly that the multitude of ills to which the human family is subject, is infinitely beyond our comprehension.

CHAPTER III.

ANATOMY OF THE DIGESTIVE ORGANS.

The digestive apparatus consists of an alimentary canal, comprising the mouth, pharynx, esophagus, stomach, and intestines. In connection with this canal, there may be reckoned the salivary glands, the liver, and pancreas, the fluids of which are more or less immediately concerned in the process of digestion.

1. *Mouth.*

The parts which compose the mouth are the *lips*, *cheeks*, *palate*, *tongue*, *teeth*, and *salivary glands*. The form of the mouth is not always the same, but undergoes remarkable changes from the earliest period of life to extreme old age.

2. *Salivary glands.*

There are three glands about the cavity of the mouth and lower jaw which secrete, or form, the saliva; and are hence called the salivary glands—they are the *parotid*, *sub-maxillary*, and *sub-lingual glands*.

3. *Teeth.*

The teeth are the hardest parts of the body, and in their chemical character they resemble bone. They are

composed of two parts, the bony substance and the enamel, and their number in an adult is thirty-two. Their most important office is to masticate the food; and the want of teeth, or the neglect of using them, is a very common cause of disordered digestion.

4. *Pharynx.*

The pharynx is a muscular bag at the back of the mouth, of a funnel shape; its use is to convey the masticated food into the stomach. It derives its name from its office; its length is about four inches, and its greatest diameter, when moderately distended, one inch.

5. *Esophagus.*

The esophagus is that portion of the alimentary tube included between the pharynx and stomach. At its upper part it is situated behind the trachea, or windpipe; its diameter in its greatest dilatation does not exceed an inch.

6. *Stomach.*

The stomach, with the small intestine, liver, spleen and pancreas, comprehends the middle region of the digestive system, which is the most important portion, because in it the process of digestion is performed. The stomach is the broadest part of the alimentary canal, and is situated at the upper part of the abdominal cavity, under the left false ribs, and is included between the upper portion of the intestines and the esophagus. The stomach is a membranous sack, having the form of an elongated cone, a little curved, and resembles, somewhat, a

bagpipe. The stomach has two orifices; the one, the *cardiac*, which admits the food, the other the *pylorus*, or the pyloric orifice, through which its contents pass into the intestines. The size of the stomach, from its possessing the power of contracting and dilating, is various at different times in the same individual, as well in health as in disease. When not immoderately distended, in a person of ordinary size, this organ is about ten inches in length, and three or four in diameter.

Although the stomach is called a membranous sack, it is composed, according to Meckel, of four distinct coats.

The first, externally, is the *serous* coat—so called because it secretes, or exhales, a serous, or watery fluid.

The second is the *muscular*, which is very strong; and this again is composed of three distinct layers of muscular fibres.

The third is the *vascular* coat, and lies internal to the other.

The fourth is the *villous* coat, which is thin, soft, and spongy; it is also called the mucous membrane, because it secretes a mucous, semi-fluid substance. This latter membrane is continuous with the whole of the alimentary canal—from the mouth to the other extremity—though in the stomach it assumes a more villous, or velvet-like appearance.

The stomach presents sexual differences; being larger, shorter, and broader in the male; smaller, narrower, and longer in the female. Dr. Soemering has shown that the stomach of the negro is different from that of the European, being of a more rounded form, approaching that of the ape.

7. *Valve of the Pylorus.*

At the pylorus is situated a valve, formed by the folding in of the membranes, which closes this orifice during digestion, and performs the office of Janitor or door-keeper; for it allows the food in the stomach to pass, through in proportion as it is digested.

8. *Small Intestine.*

The small intestine is divided into *duodenum*, *jejunum*, and *ileum*, and is the narrowest portion of the alimentary canal. It is included between the stomach and large intestine, and is uninterruptedly continuous with both although separated by two valvular folds.

The commencement of the small intestine is called the *duodenum*, and sometimes the second stomach, and is situated in the right half of the abdomen.

9. *Functions of the small Intestines.*

"The inner membrane of the small intestine secretes the intestinal mucous, and intestinal liquid, which probably form one and the same fluid. In passing through the small intestines, but particularly through the duodenum, and from the influence of bile, aided by the pancreatic juice, the chyme is separated into two portions, the chyle a whitish fluid, similar in its chemical properties to the blood, and the fecal matter. The chyle, which is the food now digested and fitted for nutrition, is absorbed and carried into the blood, and with that transmitted to all parts of the system."

10. *Large Intestine.*

The large differs from the small intestine in form,

situation, attachments, etc. Its functions are similar to those of the small intestine, and its different portions are known by the names of *coecum*, *colon*, and *rectum*.

11. *Liver.*

The liver is the largest gland in the body, and is situated chiefly in the right side directly under, sometimes projecting below, the short ribs; in females it extends further to the left side than in males. The transverse diameter of the liver is from ten to twelve inches, and in the adult it weighs about four pounds, so that its weight may be estimated as one thirty-sixth part of the whole body, and in young children its relative weight is much greater. The function of the liver is the secretion of bile. The gall-bladder is situated in a depression on the lower face of the liver.

12. *Pancreas.*

The pancreas is the largest of the salivary glands. It is six inches long, and one inch thick; and is situated transversely at the upper part of the abdominal cavity behind the stomach.

13. *Spleen.*

The spleen is situated in the left of the abdominal cavity, behind the large end of the stomach. It is generally about four inches long, three broad, and a little less than one thick.

Besides the above organs there are situated in the abdomen the kidneys, bladder, and in females, the impor-

tant organs peculiar to their sex. All these, from the difference of function they are designed to perform in the animal economy, are of different organization, the tissue of each being peculiar to itself.

CHAPTER IV.

DISEASES OF THE DIGESTIVE ORGANS.

Dr. Good enumerates one hundred and forty-seven varieties of diseases that affect the digestive organs. It is but seldom that one of these affections appears alone, and under its own peculiar, distinctive, features; for all parts of the digestive apparatus being closely associated by nervous communication, it so happens that when one important organ is diseased, others are also involved by sympathy. Age so modifies the same variety of disease that it presents a different aspect in childhood from that which it exhibits in middle life, or in one still more advanced in years. Temperament also varies the disease; and the maladies that affect the digestive organs, as well as those of other parts of the system, are all modified, or more or less changed in their appearance and nature, by climate, season, locality, occupation, habit, sex, and by the multiplicity of circumstances with which man is surrounded.

The causes of disease are as various as the circumstances which modify and change its aspect; and among the most prominent of those which induce affections of the digestive organs may be reckoned, exposure to cold and wet in any manner, improprieties in diet, both as regards quantity and quality, eating at irregular and unsea-

sonable hours, imperfect mastication, passions and affections of the mind, fatigue, and other influences equally injurious. The multiplicity, and varied forms, of the diseases in question, have been well established by the effect of medical treatment, observations upon the living, and, more than all, by examinations of the dead.

Sec. 1. *Medical Treatment.* When disease, from a multiplicity of causes, and the influence of circumstances, assumes an almost endless variety of forms, it need be no matter of wonder that the healing art has not yet arrived at that perfection where we can say to it, "thus far shalt thou go and no farther, and here shall thy *ravages* be stayed." More, probably, has been learned during the last quarter of a century towards increasing our skill in the treatment of diseases affecting the organs of digestion, than was known before; but this, with all previous knowledge, is not yet sufficient to cure all cases that fall into the hands of the most enlightened physician. The great variety of forms under which diseases of those organs concerned in digestion appear, the different plans of treatment absolutely necessary to effect a cure, and sundry other causes, have led to empiricism and imposition, shameless and disgraceful in the extreme—equally so in those who practise it, and in those who offer themselves victims to the imposture and quackery.

When speaking of empirical or quack remedies, nostrums, etc., we mean those secret remedies or drugs which are sold as certain cures and specifics for all manner of disease or for any certain class of ills that "flesh is heir to." It is quite unnecessary for our present purpose to enumerate the thousands of articles that are

known, puffed, and swallowed, as *quack medicines;* but they may be, all, each in its own kind, found in one of the following classes; to wit—Cathartics—or those which produce purging; Emetics—those which cause vomiting; Tonics—Sudorifics—Alteratives.

1. *Cathartics* are those medicines which increase the evacuations from the bowels downwards. They produce their effect in two ways: first, by increasing the secretions from the inner surface of the bowels; and 2d, by increasing the vermicular or worm-like motion of the bowels from above downward. This motion consists in a contraction of the circular fibres of the intestines, commencing at their upper portion and progressively extending itself to the lower extremity; and it is this inordinate contraction that is commonly called *griping*, often experienced after taking an active cathartic, and which in other cases is called *colic*.

Under the head of catharties are classed *laxatives*, whose nature and effects are in no respect different from the former, save in the degree of violence with which they operate—the latter being much the less active.

The activity of cartharties is believed to depend very materially upon their solubility in the alimentary canal; some being dissolved in the stomach and affecting the whole length of the intestines in their passage through, while others remain undissolved till a short distance before their reaching the lower extremity of the canal. A knowledge of this important fact is indispensable in making a judicious prescription; and ignorance in regard to it may lead to the most disastrous and fatal results.

Carthartics are obtained from both the vegetable and mineral kingdoms; and although popular credulity has been abused by being made to believe that the former are always safely taken, and the latter are always hurtful and dangerous, we shall at present make no distinction between them. In another place the comparative merits of vegetable and mineral medicines shall receive due attention.

As the alimentary canal has been, not inaptly, styled the "store-house of diseases," so it has been made the magazine and receptacle of all manner of remedies for their cure. And because cathartics may be as useful as any *one* class of remedies they have been employed in the hands of the designing, unskilful, and ignorant, as the only curative means for all diseases, however opposite their characters. The quack remedies that are sold at all the shops, puffed in the papers, and taken by all whose credulity is equal to the impudence and ignorance of the empiric—all the multitude of "pills," "detergents," "deobstruents," "purifiers of the blood," are similar in their effects, and all belong to the class of medicines under consideration.

The history of one of these celebrated nostrums is curious; and as it is interesting, it shall be given to the reader. An individual, who for the present shall be Mr. A., had by his extravagance and inattention to business, become reduced from competence to a state bordering upon poverty. After trying various resources, and expedients, to regain his lost position, without success, one of his boon companions with whom he was conversing in regard to his condition, suggested as a dernier resort, he might become a Doctor, as he called it. "A Doctor?"

says Mr. A. "Why yes," says B. "A Doctor, to be sure—is there any thing wonderful in that?"

"There would be something wonderful in my being a Doctor—what do I know about medicine?"

"And what do you need to know about it? I hope you don't think it necessary to study, or to know any thing, to make money by selling pills. I'll just explain to you what I mean. Invent some sort of pill that will be good physic, get some handbills struck off, go to advertising, and depend upon it you can't fail to grow rich."

"The thought is a good one," says Mr. A. "But then how can I invent a pill—and then who will be the first to take it?"

"Why, go to Dr. Hartshorn and tell him you want a prescription for the most active pills he can give you; and as for taking it, I can do that myself. There is another thing necessary—you must get certificates of cures to be published and circulated far and wide."

"Well, suppose nobody gets cured; what then is to be done?"

"Trust me for that, I'll be outrageously sick; and I can hire Sam Jones, and Bill Johnson, to be half dead for six months, and cured in three days with your medicines; and their certificates will be as good as any other person's to start with. Besides, if they are not sufficient, I can get thirty more in a fortnight's time."

"Suppose people are foolish enough to take the pills and get killed instead of cured, what am I to do in that case?"

"Nothing; only say they didn't take enough—that the disease had existed so long that it was incurable, or

tell some other story to suit circumstances. On the whole, think we had better enter into partnership; you shall superintend the manufacture of the article and all indoor concerns; I will see to the printing, puffing, and selling, appointing agencies and other matters requiring attention."

The bargain between these two worthies was accordingly struck. Mr. A. obtained a prescription from Dr. Hartshorn, and on the same night his friend, able counsellor, and now valuable partner, was taken suddenly and violently ill, agreeably to his promise. *Doctor* A. was sent for, administered his medicine, and wrought a wonderful cure. Sam Jones and Bill Johnson were both, at a premium of five dollars each, as sick as men need be; they took the medicine, were speedily cured, and certified that they had been ill many months, had been under the care of the most skilful Physicians, and "given up," and one box of Dr. A's pills effected a restoration to perfect health. The newspapers were soon filled with Dr. A's advertisements, and certificates of cures; his pills were sold in all parts of the country, and sought after and greedily swallowed by invalids of all ages, classes, and descriptions. The learned Doctor and his wily associate prospered beyond their most sanguine expectations. In two years they set up their coaches and lived at an expense of ten thousand a year, and now, scarcely six years from their commencing practice, they count their half million each. A large establishment has been erected where the pills are manufactured by steam, and half of the population of the Northern States have been physicked by Dr. Hartshorn's pills; while the pro-

prietors laugh at the blind credulity of those at whose expense they have been made wealthy.

If the history of the quack medicines, so much in vogue at the present day, could be accurately ascertained, there is little doubt that a tale, similar to the above, could be told of nearly all.

It is an indisputable fact that, in this city, and the same is probably true of other cities in the United States, a great majority, if not four fifths of the Quacks are of foreign origin; writing after their names, "Graduated at Edinburgh," "having studied at Glasgow," "recently from Paris," "Licentiate of the Royal College at London," "of the University of Halle;" but many, we believe, might with more propriety be dubbed renegades from Botany Bay, or Graduates of Old Bailey. We mean this as no reproach to worthy foreigners, or to the medical institutions of Europe; our object being merely to state the fact, for the sake of showing that Quackery is more prevalent in Europe than on this side of the Atlantic, and that it finds an easy prey in the republicans of North America. It is difficult to decide which affords the most fit subject for our astonishment, the unblushing impudence of the empiric, or the downright stupidity, or as it is sometimes called, *gullibility*, of those who take his nostrums. People who claim to have common sense, and who manifest it on most other occasions, men who are educated and enlightened, and who feel as though they occupy no small space in society, and wield no little influence over their fellow men, are quite as prone to follow in the wake of some notorious quack, and to sing hosannas to his name, as those of less pretensions.

It may also be questioned which should be deemed most instrumental in the spread and propagation of Quackery, and who should be considered most culpable for its ill effects in Society—Quacks themselves, or those who, by eagerly taking their medicines, afford encouragement to their predatory operations. So eager are some to patronize empiricism, that the most palpable absurdities are received as gospel truths, and the assertions and dogmas of a nostrum-vender have as great weight as the most self evident facts. Why it is that an unlettered, unprincipled charlatan, one who makes his ignorance his boast, and who prides himself upon his unblushing effrontery and impudence, should receive the countenance and support of those who claim to be first and foremost in society is not easily accounted for. Generally, however, ignorance and assurance accompany each other, and in an equal proportion; while modesty and doubt attend extensive knowledge, especially in a science so uncertain as that of medicine. Thus the mind is compelled to yield credence to statements, facts and promises, that could emanate only from one incapable of distinguishing truth from error, or from one whose design is to deceive, cheat, and make victims of, his fellow men.

We do not say that cathartic remedies, empirically administered, always produce injurious results; but as there are many of the diseases of the digestive organs that are aggravated by irritating their lining membrane, it follows, therefore, that purgatives, being irritants, are in all such cases decidedly improper. Diseases that are benefitted by cathartics judiciously prescribed, are by their

exclusive employment, made to assume a more formidable appearance, or rendered absolutely incurable. This is more particularly the case with regard to those chronic, troublesome affections, known by the name of *dyspepsy*, *indigestion*, *bilious complaints*, and other terms equally vague and unmeaning. Maladies of this class are characterized by an almost numberless train of distressing symptoms; and so unhappy and perfectly wretched do they render their victims that they eagerly seize upon any means that afford the most distant prospect of relief, and that too, without calculating the chances, or ever dreaming of a possibility, of being made worse.

In a large proportion, if not in a majority of the diseases to which the digestive organs are subject, the mucous lining membrane will be found to be the seat of the malady; and the disease itself is found by examinations after death to consist in a greater or less degree of inflammation.

Inflammation of the mucous membrane of the stomach, is characterized in most cases by tenderness directly at the bottom of the breast bone, extending over a space, about equal to the size of a dollar. The degree of pain caused by pressure in this region, is in proportion to the degree of inflammation. Sometimes an individual thus affected is compelled to wear the dress inordinately loose, and when gentle pressure is made with the points of the fingers he experiences the most acute pain. Whoever is thus afflicted may rest assured that his disease will be aggravated by a frequent repetition of active purgatives.

It is not the design of the Author to enter minutely into the details of diseases, to give minutely a history of their symptoms and method of cure ; but to expose more briefly than he could thus do the fallacy of the notion that leads to the empirical and exclusive administration of cathartics.

It is an unquestionable fact that cathartic remedies produce their effect in two ways only, as has been before stated ; first, by an increase of the secretions, or the natural fluids that are found in the cavity of the alimentary canal. These secretions, like those of all other organs, are supplied by the blood ; and whenever they are increased in quantity the supply of blood to the part is increased in an equal ratio. Thus the supply is constantly proportioned to the demand occasioned by an irritating purgative. If, then, the mucous membrane be inflamed, purgatives only add to the flame already existing. The lining of the stomach and bowels in this case, is in a state resembling exactly an inflamed eye, where there is more or less pain and an increased secretion of tears. Any person of the least observation would perceive at once, the injury likely to result from the application of an acrid, irritating substance for the sake of increasing still further the secretion of tears ; and so any man, who knows the effect of remedies, would see in prospect the mischief likely to result from repeated purging, after the bowels are once cleared of irritative matters. The bad effects of active cathartics do not end here—nor do the ill effects of improper remedies to an inflamed eye cease with the increased flow of tears—in the latter case the eye is not unfrequently disorganized,

and the sight lost forever. In the former, change of structure is also the result, with sometimes ulceration that ends in a perforation of the intestine, causing immediate death.

Another effect is occasionally produced by active cathartics when the bowels are in an irritable or inflamed condition. And that is the rupture of one or more blood vessels, allowing a quantity of blood to escape that has proved fatal. A lady in this city, not long since, who had been for some time affected with deranged digestion, was induced to take the pills of a notorious Quack, who is accumulating his thousands by preying upon and *leading captive silly women.* These pills are represented by certificates, either forged or genuine, to be a certain and sovereign cure for all the ills and ailments that ever escaped from the box of Pandora. One dose was taken without any beneficial result, then another, and soon the contents of a box had disappeared in like manner. The man, self-dubbed Doctor, told her to take another box, as the first had only prepared the system for a final cure. A second box was paid for, which shared the fate of the first. Notwithstanding the patient had been reduced from tolerable health and strength to an extreme degree of emaciation and debility, a third box was as strongly recommended as the others had been, which, after some remonstrance, the invalid reluctantly carried home. After a severe and long continued operation from the first dose, there ensued a bleeding from the bowels which threatened to prove speedily fatal; but being in a neighborhood where medical assistance was promptly and speedily rendered,

the bleeding was for a time suppressed; although it frequently recurred, with diminished violence, for several succeeding months.

In another instance, where diarrhea had existed for some time, a single dose of the same medicine resulted in a similar alarming occurrence.

There is one other important fact that should be borne in mind by all the lovers of "powerful physic"—and that is, that oftentimes each successive dose must be greater than the one preceding. So that after a long course of purging, five, or ten times as much medicine is required as was necessary at first. It is unnecessary to explain why so many different effects are produced by the same cause; or in other words, why there shall result from a repetition of cathartics in one case, diarrhea, in another, ulceration, and in a third obstinate constipation. It is sufficient for our present purpose to know that these results, and many others, do ensue.

In a former page it is stated that the external coat of the alimentary canal is termed the serous, performing different functions from the inner *mucous* coat. This coat is also affected somewhat differently from the inner one as well by inflammation, as by the action of remedies. When the former is affected with inflammation, motion, by whatever means it is caused, produces the most exquisite pain.

The second manner in which cathartics operate is by increasing the contractions of the intestines from above downwards; and this, technically called, peristaltic, or vermicular action of the bowels causes one, suffering under acute inflammation of the serous coat of the in-

testines, to cry out with anguish. It is a spasmodic contraction of some portion of the bowels which occasions the severe pains in colic, and the same griping and sensation of twisting of the intestines, is induced when their external coat is in a state of inflammation. The disease is thus aggravated by every active cathartic, and even when the external coat is in a healthy state, disease is often induced in it, and propagated to it from the internal coat, by the unwise, excessive administration of purgative remedies.

We have seen that the digestive system consists in a number of organs, grouped together and complicated in such a manner, that for the performance of their destined functions, they are more or less dependant upon each other. Thus the action of the bowels cannot be duly and healthily performed without the concurrence of the liver; and this latter organ is deranged when the former are suffering under disease. One common effect, never dreamed of by wholesale dealers in physic, is the ease with which inflammation is propagated through the whole extent of one organ, or from one organ to the adjacent, which are connected by a continuous membrane. The duct which conveys the bile from the liver into the intestines is lined with a prolongation, or extension of the same membrane, which lines the latter organs; or if the membrane is not precisely the same, it is similar both in structure and function. Thus it is that when any portion of the mucous, as well as the serous coat of the intestines, is inflamed, the inflammation is liable to extend, as it often does, throughout their whole extent. And the lining of the biliary duct, being continuous with that

of the intestines, is generally diseased when the latter is so where the duct enters it. The membrane lining the duct, is again extended and ramified in the substance of the liver, so that this organ becomes greatly deranged in function, and permanently remains so after the primary disease in the intestine shall have subsided. But this mischief does not stop here. The bowels, receiving from the liver, bile of a depraved character, or too much, or too little in quantity, cannot perform their healthy functions; and the very thing that caused the evil is again administered with a view to effect a cure. Fuel is only added to the flame; and the more the use of purgatives is persevered in, the more is the disease aggravated, and the greater seems to be the need of their employment, till the poor patient is physicked out of existence.

It must not be understood, from the preceding observations, that the most active cathartic medicines are always hurtful, or improper, when administered by a judicious and skilful hand. But we have no more reason to believe that remedies of this class, indiscriminately administered by any one, much less by him to whom all knowledge of the human system is as a riddle, are adapted to all diseases, than we have to believe that the same garment will fit, indiscriminately, all the inhabitants of the city of New York. Neither is it true that medicines vended by Quacks, do, in all cases, prove injurious; but on the contrary, they are sometimes productive of the best effects. Such cases, however, are only those where medicines of this character are indicated; and strange, indeed, it must be, if a successful

application is not now and then made. Although, even here, the good that is done is not attributable to the specific virtue of any particular nostrum, for the same result would most likely have occurred if any other medicine of the same nature, had been administered. There are few, indeed, if any, cases of disease in which it is not proper, and indispensably necessary to administer remedies that evacuate the bowels; but to accomplish this, it is by no means expedient to resort to the pretended and secret inventions of Quacks. Any of the common articles known to every person over ten years of age, rhubarb, or castor oil for instance, produce their effect with the utmost safety and gentleness, and are equal in efficacy to the most active combination of purgatives ever invented by the most notorious Quack.

An empiric of the first water, not many years ago, had made himself famous for the cure of all human maladies, by the administration of peculiarly large pills of his own invention. What contributed not a little to the increase and spread of his reputation was the fact, that he used frequently to tell his patients, that, from their symptoms, he was confident some particular substances were lodged in a portion of the alimentary canal. At one time he would tell a patient that he had apple seeds retained in his bowels; and again he would tell another, that he had kernels of different fruits, and grains, in his stomach, and if by questioning gentlemen he could ascertain that they were fond of shooting, it was not seldom that he attributed their complaints to having accidentally swallowed a few shot. As nothing could so conclusively prove his prognostics correct, as the simple fact of finding the arti-

cles named, so the old gentlemen's character for wisdom and skill became more and more firmly established ; for the identical causes of mischief were invariably discovered after taking a dose of the "big pills." At length, a lady of the first respectability, having suffered a long time from deranged digestion, applied to the celebrated doctor for assistance. After a few questions, he told her very promptly that he understood her complaint, that he knew what ailed her, and more than all that, her doctor was a fool, and assured her that his big pills would effect a cure. Neither of these assertions she exactly credited, but nevertheless, concluded to try his remedy if he would make known to her the complaint. "Why," says he, "you have got lemon seeds in you—you must take some of my big pills and get rid of them, and you'll be perfectly well again." "Why, Doctor," said the lady in amazement, "I have not eaten a lemon for six years ; and what you say is altogether impossible."

"No matter, madam, if you have not eaten a lemon for twenty years, the fact is just as I tell you, and if you will take the pills you can be satisfied of it."

The pills were taken, and to the utter astonishment of the patient, the lemon seeds were found ; a second dose was taken and still more seeds made their appearance. A thought now flashed upon the lady's mind. One pill was yet left which she examined, and behold ! *a lemon seed* in its centre—the secret, truly, of the Doctor's astonishing wisdom, and successful practice.

2. *Emetics.* Emetics are those substances which produce vomiting from some specific property they possess, independently of any unpleasant taste or smell. There

is no danger that any thing, short of the most perfect infatuation, will ever render medicines of this class of so general employment in the hands of Quacks, as those to which we have previously given our attention. Their operation is attended with such distressing, and not unfrequently alarming sickness, that few comparatively can be induced to submit to this practice; and thus the speculation is generally unprofitable to the empiric who is so bold as to engage in it.

No article can produce vomiting but such as causes an irritation of the stomach, and most substances that do so, like the active cathartics, possess acrid, stimulating properties. In gastric affections where digestion is deranged, there is often experienced a sensation of distension, or of a load at the pit of the stomach; and an attempt is made to remove this load, as it is called, by an emetic. To the surprise however, of the suffering party, nothing is vomited but a small quantity of mucous, watery fluid, quite inadequate to account for the previous symptoms, and accordingly another emetic is administered, but with no better effect. The relief afforded in such cases, if there be any, is merely temporary; and there is soon the same necessity for a repetition of the medicine as there was at first.

The sensation of a load in the stomach at such times is not caused by any quantity of matter, but is the sole result of the diseased membrane lining its internal cavity, giving a sensation which is purely deceptive, and when relief is afforded by an emetic it is because the diseased action is temporarily changed or superseded. But even a temporary remission is not always procured, the dis-

ease, being immediately and permanently, and often incurably, aggravated. At the commencement of an illness, before it assumes any regular and tangible form, when the nicest judgment is requisite in the choice and administration of remedies, much evil is done by the use of emetics; and what physician is there who has not found some of his most obstinate cases induced by the injudicious or empirical employment of emetics?

An individual, after unusual fatigue, or exposure to wet, or cold, night air, or any other cause sufficient to derange the health, complains of lassitude, more or less headache and chilliness, loss of appetite, nausea, tenderness at the pit of the stomach on pressure, pain in the back and loins, and other symptoms that generally usher in a febrile attack. An emetic is now administered without affording the anticipated relief, but is followed by an obvious aggravation of all the preceding symptoms; the remedy is perhaps repeated, with a still more decidedly bad and unhappy result. The ultimate effect in this case is inflammation of the stomach, which, by proper treatment, might, with great certainty, have been prevented.

Such is not always the effect of an emetic; but it is so often so, that remedies of this nature ought never to be administered without the utmost caution and circumspection. And who shall be the person to prescribe them; one who has made medicine his study, one who has devoted years to the investigation of the diseased and healthy condition of his species, or one who boasts of his ignorance, and treats all knowledge and science with contempt?

When bile is vomited with violent retching towards

the latter part of the operation of an emetic, it is considered as proof postive, equivalent to actual demonstration, that the remedy was the very thing needful. The previous unpleasant symptoms are then attributed to the presence of bile in the stomach, and when they recur, as they often do, the medicine is repeated. The theory and practice in such cases are equally erroneous, and are followed by disagreeable consequences; but the truth may be explained in few words, and most easily comprehended. The lower orifice of the stomach, that which opens into the upper portion of the intestine, and the orifice of the duct which conveys the bile into the same portion of intestine, are but a few inches distant from each other. In vomiting, the peristaltic action of the stomach is inverted, the motion being from below upward; and sometimes this inverted order of action is communicated to the whole length of the alimentary canal. In less severe cases however this action is only communicated to that part of the intestine more immediately connected with the stomach—that part into which the biliary duct enters and deposites its contents. When, therefore, this portion of the bowel acts in sympathy with the stomach, whatever quantity of bile is poured into it must be evacuated upward instead of downward. And farther, the action of vomiting, if it does not actually increase the secretion of bile, nevertheless assists in discharging it from the liver and gall-bladder. And thus its flow is temporarily greatly augmented, and being evacuated by the mouth, confirms the previous predictions of those who knew no better, that bile had accumulated in the stomach which it was necessary to dislodge.

In persons of plethoric, or full habit, there is great danger in the administration of emetics. Individuals of this description are generally of the sanguine temperament, prone to hemorrhages and inflammatory diseases; and as the violent spasmodic actions in the efforts to vomit cause a determination of blood to some organ, the rupture of a blood vessel may be produced, or the engorgement may continue after the vomiting has ceased, and terminate in a more or less active inflammation. Apoplexy is thus caused; blood being effused into the substance of the brain by the rupture of a vessel; and from this cause have occurred alarming bleedings from the lungs, stomach, and other of the viscera.

There is, generally, more or less of headache in most cases where empirics think proper to use their favorite remedy; and in cases where the head is affected, the danger is infinitely magnified.

Again, there are those of such peculiar constitution, and they are by no means rarely met with, in whom an emetic occasions more or less general convulsions, extreme prostration, or something still more alarming. In some a small dose of a given medicine will occasion effects tenfold as great as in others; thus, in one, a fourth part of a grain of tartar emetic will produce excessive vomiting, while another would require five or six grains to produce nausea. So different are constitutions, even in members of the same family, that of two brothers with whom the author is acquainted, one is readily vomited with the sixteenth of a grain of tartar emetic, and the other has taken four ordinary doses, in immediate suc-

cession, without having experienced the slightest degree of nausea. So peculiar is the latter brother in this respect, that his stomach has always resisted every attempt to excite vomiting, and at no time in his life does he remember to have had it nauseated. In a stomach like this, where medicine is administered by an empiric with a view to excite vomiting, it is most probable that inflammation would ensue before he would have attained his end.

Besides the vomiting caused by articles of this class, there is yet another effect upon the bowels; and that is their operation as cathartics. This is not universal; although it is generally produced by most medicines of this class. And when there is a predisposition of the bowels to be easily affected, there is often induced a diarrhea and diseased condition of the intestines that is not easily subdued.

Again, in some cases where emetics have been frequently repeated, an effect is produced upon the stomach totally different from that produced in the bowels by cathartics; and that is the facility with which vomiting is produced. Thus, one who has been in the habit of taking cathartics will find, after a time, that the dose must be doubled, quadrupled, or increased still further, to produce the desired effect; but one who has been in the habit of taking emetics will find that the original dose must be reduced in proportion to the frequency of the repetition of the medicine. In the former case the susceptibility to the impression of medicine is diminished; in the latter it is increased.

Lobelia Inflata, commonly known by the name of

Indian tobacco, is the only article that has of late done much mischief as an emetic in the hands of Quacks. It is one of the most powerful vegetable poisons, and designing, ignorant impostures have succeeded in inspiring many with confidence in its efficacy as a remedial agent, and in its applicability to all varieties of disease. Physicians have universally rejected it as too powerful to be used as an emetic in general practice. Doubtless, Quacks have sometimes done good with this, but the good has been in no proportion to the evil; and the same is unquestionably true of all their nostrums.

The United States Dispensatory, a good authority as exists in any language, thus discourses of lobelia:

"The leaves or capsules when chewed for a short time, occasion giddiness, headache, general tremors, and ultimately nausea and vomiting. When swallowed in the full dose, the medicine produces speedy and severe vomiting, attended with continued and distressing nausea, copious sweating, and great general relaxation. Its effects in doses too large, or too frequently repeated, are extreme prostration, great anxiety, and distress, and ultimately death, preceded by convulsions. Fatal results have been experienced from its empirical use. These are more apt to occur where the poison, as sometimes happens, is not rejected by vomiting. In its operation upon the system, therefore, as well as in its sensible properties, lobelia bears a close resemblance to tobacco. As an emetic, it is too powerful, and too distressing as well as hazardous in its operation for ordinary use."

The following example of the ignorance and wickedness of those who are most fond of prescribing lobelia is taken from Beck's "Medical Jurisprudence."

"A melancholy instance of death occasioned by the use of this plant in the hands of a Quack is detailed in the sixth volume of the Massachusetts Reports, in the trial of Samuel Thompson, an empiric practising in Beverly, for the murder of Ezra Lovett. In this trial, it appeared that the patient, being confined by a cold, sent for the pretended physician, who gave him three powders of lobelia in the course of half an hour, each of which vomited him violently, and left him in a great perspiration during the night. The next day two more powders were administered, each of which operated by vomiting, and occasioned great distress. In like manner two other powders were given the subsequent day, leaving the patient in a state of great prostration. Several days after this the physician (?) came again, and finding his patient still worse, administered several more powders, which occasioned great distress, and at length ceased to operate. Finding that the stomach was not sensible to the emetic effect of the lobelia, the physician (?) repeated the dose, and when the patient complained of great distress at the breast, and said he was dying, the doctor (?) assured him the medicine would soon get down, or operate as a cathartic. However, on the same evening, the patient lost his reason, and became convulsed, so that two men were required to hold him. To relieve which, the doctor forced down two more of his powders, and the patient, as was expected, grew worse, and continued so until he expired.

"The doctor, who had thus terminated the disease and the patient at once, was arrested and put upon trial for murder. But the homicide proving a legitimate one,

from the want of a sufficient evidence of malice prepense, he was acquitted and set at liberty."*

The empiric Thompson either did, or did not, cause this man's death; and the bare narration of facts speaks trumpet-tongued in the affirmative. It is, indeed, a self-evident proposition that admits of no argument, or no proof. If Thompson then actually caused the man's death, if he is not legally, he is at least morally, guilty of murder. If he knew the legitimate effect of the medicine when administered in too large doses, he ought to have been held amenable to the laws; for we conceive that there can be but little difference in the degree of guilt attached to two acts, when in one, evil is designed, and, in the other, it is known that evil will certainly result.

If Thompson did not know the effect of his medicine, then he erred either through ignorance, or derangement of intellect. If from the former, he knew less than his fellow men in general. For it is the common understanding that Indian tobacco is a deadly poison; and society—the sovereign people, the makers of laws—owe it to themselves, to their safety, to provide enactments making it penal for such men thus to sacrifice life. If it was from mental derangement, then the same power should provide a residence for such characters in some comfortable asylum for the insane, or effect a cure of the malady by administering their own medicine.

3. *Sudorifics.* Before entering upon the consideration of Sudorifics, it is expedient to premise a few observations in regard to the functions of the skin.

* Bigelow's American Botany, Vol. I. p. 181. Tyng's Massachusetts Reps. Vol. VI. p. 134. Commonwealth vs. Thompson.

The whole surface of the skin has been estimated to contain from thirteen to eighteen square feet; but the general opinion seems to be that it amounts to sixteen square feet. From its whole surface, though much more from some parts than others, there is constantly exhaled a watery vapour. When this passes off insensibly it is called insensible perspiration; but when it is not evaporated, or when it is so condensed as to form a fluid, it is called sweat. The quantity of perspiration varies according to the difference of climate, season, occupation, diet, state of the atmosphere as regards humidity, and sundry other circumstances; it is indeed as various as the evaporation of water from the surface of the earth.

Many experiments have been instituted with a view to ascertain the exact quantity of perspiration from a healthy individual; but so constantly variable is it that approximations to the truth have only been made.

The indefatigable Sanctorius, for a space of *thirty years*, weighed all his food and drinks, and all the evacuations from the body, with a view to ascertain the quantity of pulmonary and cutaneous exhalation. We may contrast the patient investigation of this physiologist with the management of empirics both in and out of the profession; the object of the former being knowledge, that of the latter, money.

Rye, who made his experiments at Cork in latitude 51° 54′, found the daily average estimate of perspiration as follows, for the different seasons.

Winter,	53 Ounces.
Spring,	60 "

Summer,	63 ounces.
Autumn,	50 "

Thus making the daily average of perspiration throughout the year to be 56 ounces—or three and a half pints.

Keil makes the average daily perspiration thirty one ounces. His experiments were made at Northampton, England, lat. 52° 11′.

Hartmann, when the solid and liquid food and drinks amounted to eighty ounces, found the perspirable matter forty five, or forty six ounces. Von Gorter, in Holland, where the food and drink amounted to ninety one ounces, found the perspiration to amount to forty nine ounces.

Dodart, in France, estimates the average daily perspiration at thirty three ounces and two drachms; and Sauvages, in the south of France, found that when the aliment was sixty ounces, the perspiration amounted to thirty three ounces.

Haller constructed the following table showing the amount of perspiration for each month daily in the year, in ounces.

December,	42
January,	39
February,	37
March,	43
April,	47
May,	58
June,	71
July,	86
August,	70
September,	77
October,	40
November,	40

After Haller, no experiments were made to ascertain the amount of perspiration till Lavoisier and Seguin instituted theirs, the most celebrated of all preceding. But one only, of the interesting conclusions to which they arrived need be given in this place, to wit: from the average of all the experiments, it seems, that the insensible perspiration amounts to eleven grains per minute, equivalent to thirty-three ounces, or a little over two pints, in the twenty-four hours.*

Sudorifics, perspiratives, or diaphoretics, are those substances which increase the quantity of exhalation by the skin. The articles which produce this effect are numerous, and of greatly diversified character, from the most active stimulant to those whose operation is directly the reverse. Some medicines produce perspiration by relaxing, and debilitating the general strength of the system, some by simply refrigerating properties, and others again by the heat they communicate when either externally or internally applied.

The system is not, at all times, in a condition to be beneficially affected by the same remedy; on one day suffering under great febrile excitement, and on another, laboring under a severe chill. When the former of these two states is present, nothing is more of a popular remedy than hot sling, or hot herb tea; and the same remedies are also administered when the system is in an opposite state—when the skin is cold and the hands and feet are cold also. But the consideration of the propriety

* See Prof. Dunglinson's Physiology for much that is interesting in relation to this subject.

of this practice we propose to defer till we come to speak of the effects of remedies in diseases of the lungs.

There is one remedy belonging to this class, which, from its activity, as well as from the favor it receives from the public, deserves our notice—we allude to bathing, under the various forms of cold, shower, warm or hot, and vapour baths.

We have seen that there is a quantity of fluid exhaled from the skin equivalent to, at least, from one to two pints every twenty-four hours; and so important is it that this exhalation should take place that, to checked perspiration is attributable a great proportion of all the diseases for which physicians are called upon to prescribe. When the perspiration becomes suddenly suppressed, the blood retires from the skin and the more superficial parts of the body, and is thrown, in an unusual quantity, upon the more internal organs, whose functions become more or less deranged, and which attempt to perform for the skin what that organ is unable to do for itself. Thus then it is, that in nearly all the cases of what are called *colds*, the first link in the chain of disease is suppressed perspiration; and the consequences of this are various affections of the bowels, lungs, kidneys, etc.

When the determination of blood takes place to the mucous membrane of the intestines, there is often diarrhea; when to the lining membrane of the lungs, hemorrhage, or mucous expectoration; and when to the kidneys there will be an increased quantity of their natural secretion. Restoring health by recalling the circulation of blood to the surface of the body, and exciting perspiration, is purely philosophical treatment; but philoso-

phical discernment, instead of blind empiricism, should prescribe the remedy. Hardly any system of medical practice is capable of accomplishing more good in invalids laboring under the numerous diseases of the digestive organs than bathing, in some one of its forms; and that which is most likely to produce very much of either a good or bad result, is cold bathing. This is not a thing, of which it may be said, that, if it does no good, it can do no harm; but, on the contrary, we may pretty certainly predict that if it does no good, it will most likely do positive mischief. The practice of the Russians is frequently quoted to prove that great changes of temperature may be experienced with impunity. They enclose themselves in heated apartments till a profuse perspiration breaks out, and in this state, allow buckets of cold water to be dashed over their persons, or they plunge headlong into the snow, and then proceed to their usual occupations. It must be borne in mind that they are healthy individuals who thus sustain the rapid change from heat to cold, and *vice versa;* and we should also not forget that they have been accustomed to this from early infancy. What, in their case, is felt to be only a luxury, would, in invalids, or those of delicate constitutions, cause a shock from which the system in many instances would never recover. That ill effects should follow a reduced temperature it is necessary that the circulation of the blood in the surface of the body, and especially in the skin, should be rendered less than it is in health; but, although the Russians emerge from a room at a temperature of 140 degrees, and plunge into the snow, the vigor of their circulation is such that it is continued in the skin; or, if

it is temporarily thrown internally, it soon resumes its wonted flow, and the skin its healthy functions. The perspiration does not become in them positively checked, it is so only relatively—it is less than it was when in the heated apartment, but not so little as it would be were they to remain in the snow, or cold water, a little longer, or did not their subsequent active exercise counteract the effect of the reduced temperature.

In those laboring under chronic affections of the digestive organs, cold bathing should be employed with the greatest caution; for, to be productive of any good result, reaction ought to succeed its application. The subsequent elevation of the temperature of the skin ought to be in proportion to the degree of chilliness, or general shock given to the system; and if there be much internal disease, it is only aggravated, and the anticipated good is a real evil. Again, there may be but little disease, with much general debility and a feeble constitution; in some such cases, too, no reaction follows general cold bathing, and its effects are decidedly injurious.

The preceding remarks are intended to apply to the immersion of the body in cold water, and not to the cold shower bath. The latter, however, is pretty nearly the same thing in its nature and general effects; it differs only in degree, bearing the same relation to the former that a mighty giant does to a puny stripling. The shock caused by the latter is much more sudden and powerful; and has been known to produce the most alarming, and fatal prostration. A remedy like this ought seldom, if ever, to be prescribed for those whose nervous systems are susceptible to slight impressions;

and least of all should it be indiscriminately employed by an empiric.

The tepid, or warm bath, is of late much more in use than formerly; and it is to be regretted that an apparatus for warm bathing is not attached to every house; the expense would be but trifling at first, while it would be afterwards saved, many times over, if we rightly estimate health and comfort. The only possible danger in the use of the warm bath is that its temperature may be too elevated; and it may, therefore, be commended to all who can have it in their houses, with a desire that others, also, may partake of its benefits in some public establishment.

The vapour bath consists in the application of steam to the surface of the body till a more or less copious perspiration is produced; its general effects are similar to those of the warm bath, while both produce the same result, perspiration, in a different manner from the cold, or shower bath. In the latter the heat of skin, that is, the temperature of the body, is first reduced, then the vessels react, and perspiration is the consequence. In the former there is no reduction of temperature at all, but on the contrary it is elevated by the direct application of heat; a perspiration ensues which becomes profuse in proportion as the heat is increased. A great degree of heat applied to the body by means of the vapour bath will do much less injury to the system than when the body is immersed in water at the same temperature; but when the perspiration flows freely for a length of time in the vapour bath, the ultimate result, in cases where it is proper to be used, is not

always as favorable as is anticipated. It is supposed, in regard to this as to other remedies, that if a little is good, more is still better; and, therefore, when the perspiration is suppressed,—where the skin is dry and torpid, it is erroneously believed that benefit is to be derived in proportion to the quantity of perspiration, rather than to a healthy, natural, performance of its functions. The perspiration, as well as the other fluid evacuations from the body, are derived from the blood; so that the vapour bath acts as a direct depletive and debilitant, by reducing the quantity of blood upon which the system depends for nutriment and strength. A state of debility may be thus induced, as well, and nearly as rapidly, as by opening a vein in the arm; and frequently copious perspiration in delicate individuals has been followed by long protracted fainting. There is danger, too, in the use of this remedy, in those who are predisposed to affections of the head, and in those of a plethoric habit; for the heat may be so great as to cause a rupture of a blood vessel in the brain, or in some other important organ; and the same result may follow from a hot water bath.

In those diseases of the digestive organs where the vapour bath is most applicable, there is also required the greatest caution in its employment. The cases to which I allude are those in which, from the long continuance of the disease, from lack of nutriment by derangement of the digestive function, and perhaps other causes, there is positive debility, with a cold and dry skin from a want of determination of blood to the surface. In an invalid presenting these symptoms there can be no question of the utility of the vapour bath, provided it be used with

discretion; but if employed immoderately, either by a too frequent repetition of it, or by causing too great a flow of perspiration at any one time, injury instead of benefit will be sure to follow.

Medicated vapour baths, in diseases of the digestive organs, are of no special benefit, save to the proprietors, to increase, by a captivating name, the number of their patients; they differ from the common vapour bath only by having the vapour passed through a quantity of aromatic herbs.

We might here drop the subject of bathing, in all the forms in which it is employed, had not this country been overrun, of late, with a race of men denominated "Steam Doctors," whose course, like that of the Indian Cholera, has been marked by death. It is not by the steam of hot water alone that they perpetrate their ravages on the confiding and credulous; but they summon to their aid two most potent articles, and thus armed, they bid defiance to disease. If, perchance, one patient is blessed with strength of constitution sufficient to withstand their incendiary treatment, his fortunate escape from immolation is considered a most miraculous cure; and, stimulated by this, the steamers proceed in exterminating their patients and the disease at a single blow. When this is the case, their sins are hidden in the grave, and they prowl on, seeking other victims; their murders, like that of the infamous Thompson, are considered legal, because there can be found no "malice prepense." It would be unjust to deny that the steam doctors have ever done good, to assert that they have never effected cures by their practice; but where one instance of good can

be pointed out, there may be found ten where the results have been most lamentable. We make no other appeal than to facts, and the common sense that the God of nature has given to all mankind; and when they know the properties of the articles used by steam doctors, and their effects upon the human system, we leave the question to all our fellow men to decide, whether they shall die by the hands of steaming quacks, or by some more direct, and more expeditious, suicidal means.

The two articles employed by *steamers* in conjunction with the one from which they derive their name, are Lobelia and Cayenne pepper. Of the former of which some account has already been given. The nature and properties of Cayenne pepper are readily understood, and duly appreciated, by those who have once eaten it on their food; and its character as a stimulant will not be forgotten by one who has smarted from its external application. It produces the most intense inflammation when moistened with water or vinegar and applied to the skin; and when it produces such an effect used externally, we may conclude, *a fortiori*, that the same effect will be magnified when used internally, where it comes in direct contact with the delicate, sensible coats of the stomach. In fact, we need not have recourse to logical deductions to arrive at this conclusion; the naked fact speaks for itself beyond the possibility of doubt or contradiction.

When the stomach and bowels are in an inflamed or irritated condition, can any person, who lays claim to an ordinary share of common sense, raise the question in his own mind, whether such an article can be safely ad-

ministered? But those who prescribe it are as ignorant of the actual state of the diseased organs, as they are destitute of the sense of moral obligation, or the responsibilities they are under to their fellow men; how then should they be able to anticipate its effects? A case occurred, not long since, in the practice of my friend Dr. Gunn of this city, that demonstrates the nature of Cayenne pepper. The Doctor was called to prescribe for a child who was slightly indisposed with derangement of the digestive organs; he ordered a foot bath with a quantity of pepper to be added to it; and a cup-full of the infusion of senna and manna to be administered in the course of the night. The mother, who was a native of the Emerald Isle, committed a most unfortunate mistake; she bathed her child's feet in the senna tea, and forced it to drink the pepper, and when the Dr. called next morning to see his patient, he found it suffering the most intense anguish, which, in a few hours, terminated in death.

The Cayenne pepper does less injury when its administration is followed by the vapour bath, in the hands of the quacks, than when given alone; for the inflammation it excites is in a great degree remedied, or its effects obviated and counteracted, by the profuse perspiration. The lobelia also operates as a counter agent; its effects have been shown to be of a debilitating character, prostrating the strength even to such a degree that it cannot be again restored; thus we have two powerful agents to combat the pepper, both acting in direct opposition to it. And well would it be for the community, that part of it at least who fall into the hands of "Steam Doctors," if the soi-disant doctors would, in all cases, administer an

antidote sufficiently powerful to counteract their own mischief.

How much laborious investigation, how much toilsome study, how many years devoted to research, how much money bestowed on the cultivation of medical science, what a sacrifice of health and life to anatomical pursuits, could all have been saved and prevented if the discovery of the steam practice had been sooner made. But so it is, improvements are even tardy in being adopted and rendered generally useful; although, in relation to this subject, it seems that the facility with which a knowledge of steam and lobelia are acquired and applied to use, will compensate for their having been so long hidden from mankind.

A single instance of modern doctor-making will serve as a specimen of the general character for science, and medical knowledge, of the whole genus of steam doctors. An only son of a kind hearted, and indulgent father, had trifled away his time till, at the age of five and twenty, he found himself without any profession or occupation, and with too little energy or manliness to obtain one. It so happened that his resources had sadly diminished, when a steam quack was sent as a scourge upon the region of country in which our future Esculapius resided. The fame of this knight of red pepper, steam and lobelia, had preceded him, so that he was heartily welcomed by the expectant disciple. An acquaintance was soon formed between the two worthies; and, for ten dollars, in a single night the spoiled child became a full fledged doctor, stocked with all the wisdom, science, and skill, necessary to the cure of all diseases. Strange what a metamorpho-

sis was here effected; an ignoramus retires at night, uncertain how he is to procure an honest livelihood even for a single day; but, before the revolution of another twenty-four hours, he has attained the end of the hopes, and ambition of thousands—he has procured the means, not of transmuting metals into gold, but of transferring gold from the pockets of others to his own. In other words, he has bought a small duodecimo volume containing the whole of medical science—the plan of steaming—and he sallies forth, like a knight-errant, even a veritable Don Quixote, to relieve all unhappy damsels, distressed widows, and sick children. Like a harpy, he scents his prey at a distance; and wherever he can hear of a sick person, no matter whether he is attended by a physician or not, thither he directs his course; and by impudence, promises of a certain cure, and denunciations of "apothecary doctors," attempts to impose upon the patient, and his friends, his homicidal quackery. This is not all, for sometimes he is successful in perpetrating his practice upon the credulous; and happy is the patient who lives to boast of his recovery.

A steaming quack, of a stamp like the one above described, made an effort to introduce the steam and red pepper practice into the family of his friend, who had four children lying sick with scarlet fever, of a most inflammatory character. The father, a man of extraordinary sense, could not submit to the dishonour of dismissing his regular physician, who had long been his firm friend and faithful servant, at the instigation of a selfish impostor, and, to place in hands so unworthy, the lives of so many of his children. No one who has in his head a

single correct principle of the philosophy of the human system in health or disease, or who knows any thing of scarlet fever, would dare, for any consideration, or under any circumstances, to prescribe such incendiary remedies, or even to think of so doing. To expect a favorable result from such practice, would be as philosophical as to expect to cure a wound by making it still deeper, to effect union in a broken bone by fracturing another, or to cure a burn by the application of boiling water.

We need not in this place dwell longer on the subject of steam doctors; those of our readers who have not become experimentally acquainted with them, probably will not, and those who have, and have watched their progress, can attest to the fact of their destructiveness—to their having been palpably and ostensibly the cause of putting a brief period to their patients' existence. If the same charge is brought against the regular bred physician, we can, in this place, only reply, that his doing wrong does not excuse or palliate the errors of another—that each one is answerable for himself; and that in due time, the merits of the regular bred physician will receive from us ample attention.

4. *Tonics.* Under this head are ranked those medicines which impart tone and vigour to the system; and, as medical writers say, which do not possess any stimulating properties. There is, unquestionably, a difference between the action of a diffusible stimulant like alcohol, ammonia, or ether, and Peruvian bark, iron, or any other tonic usually employed; but when we analyze the manner in which tonics produce their effects, we shall find, that, if nature speaks intelligibly, tonics are nothing more

nor less than stimulants. They are, indeed, less active in their operation, though not the less sure; and their effects upon the system, either good or bad, are much more permanent. It is, in fact, almost impossible that there can be an active tonic, one that is capable of exciting any appreciable action in the body, which is not more or less, either a local or general stimulant, according to the dose in which it is administered, or some circumstances that influence its operation. If they do not act, generally, by increasing the frequency of pulse, heat of skin, and the activity of the circulation throughout the body, they yet produce a local effect which may, perhaps, be denominated irritation; and that irritation, if increased in degree only, might terminate in inflammation. Tonics, when they produce their legitimate effect, cause a tendency to an inflammatory diathesis; or in other words, they induce that state of the system in which inflammation is excited with more than ordinary facility. And in those habits where the inflammatory diathesis already prevails, or where there is some local chronic affection, tonics cannot be administered to any extent with impunity. Therefore, in diseases of the digestive organs, and in all cases of stomach affection, where this inflammatory tendency exists, medicines of this class are most decidedly injurious; and, coming directly in contact with the mucous membrane when the stomach is diseased, the mischief is thus doubly increased. Unlike active stimulants, which may only temporarily aggravate the disease, tonics fasten it more firmly where it is already seated, and are followed by a long sequel of suffering.

To the class of tonics belong all the multitudinous forms of "bitters," "bracing medicines," "stomach bitters," "tonic pills," "strengthening medicines," and nearly all the nostrums, which do not cause increased evacuations from the body, and are palmed upon the community as cures for dyspepsy and other ailments. These medicines, or their more active constituents, are found to possess tonic properties; doing good of course when they are indicated, but doing much mischief when they are contra-indicated.

With these views, it may not be inconsistent with the philosophy of the subject, to associate with tonics the more active stimulants—those articles which more rapidly produce excitement, and exhilaration of spirits; for the two are not unfrequently combined in the practice of charlatanry. As an instance of this combination of tonic and stimulant we may mention wine bitters, or bitters to which spirit of any sort is added; the activity of the compound being thus increased, its capability for good or ill is also augmented.

It is believed, by many medical men foremost in the ranks of the profession, that all diseases, of whatever organ, are of an inflammatory character; if this be true, then, tonics are not only unnecessary, but are positively hurtful. However this may be, one thing is certain, that medicines of a stimulating and tonic nature are of essential service in the restoration of health, and invigorating the strength of the constitution. When they are thus beneficial, it may be that there is present no actual disease, but rather a state of general debility, where all the powers, to use an expressive and well known phrase, are

below *par*, or below the standard of health. We may thus grant all that any one may be disposed to ask, to wit: that tonics are necessary and useful; there will still remain a great majority of cases in which they cannot be administered with safety, or any reasonable hope of benefit.

In many diseases of acute inflammation, where copious, and perhaps repeated, bleeding is necessary, and where it is indeed the sheet anchor—the only remedy on which reliance is to be placed—is to be seen the greatest prostration of strength, the most perfect and complete apparent debility. The most casual and common observers, not in the ranks of the profession, must have witnessed instances of this kind themselves; they must have seen the most robust individuals, who, from a state of vigour able to endure any fatigue, have been in a few hours so prostrated by disease as not to be able to walk, or to sit. This state they have seen removed, and the patient able to raise himself in bed, or to walk across the room, after the abstraction of a large quantity of blood. Where was the strength, the muscular power, and why is it that taking blood, which debilitates an individual in health, restores strength to another? The appearances in these cases are deceptive; the strength is overpowered by disease, not annihilated; muscular power is, for the time, paralyzed, oppressed, not destroyed—it results from the diseased condition of some important organ, and they stand in relation to each other as cause and effect; and, therefore, when the cause is removed by the loss of blood, the strength is at once restored.

A great majority of chronic diseases, of whatever

name, or wherever located, being more or less inflammatory, are more or less productive of what is commonly, though erroneously called debility, or weakness, which is attempted to be removed by a course of tonic medicines. Who has not witnessed the increase of debility, a general aggravation of all the ailments of an invalid, by taking tonics? And who does not know that it is a frequent complaint of invalids that they cannot "bear bracing" —they can take nothing to give them strength, for every thing stimulating or *bracing*, makes them a great deal worse? Many, by the advice of their friends, or merely to gratify their own caprice, take first one article of this class, then another, and thus go the rounds of these, as they do of other nostrums, and finally come to the conclusion that medicine is all a humbug, and those who practice it impostors.

It is not to be inferred, from the preceding remarks, that all chronic, or even acute diseases are to be cured by bleeding; the question is, how are they *not* to be cured? And the answer we have endeavoured to give is "not alone by tonics;" and in regard to this matter, let the physician, and not the quack, be the sole judge.

5. *Alteratives.* By the term alteratives, are recognized those articles of the materia medica, which do not produce any immediate, perceptible, operation in the animal economy, but whose effect is to change, or alter the action of one or more of the organs. The term is one of vague import; and the profession would suffer no detriment if it were at once expunged. Still, it is expressive of the character of a class of remedies, or rather of the action of many medicines when administered in a

certain dose; for many of those, which are valuable, as alteratives, are also most valuable, as evacuants. It might perhaps be more proper, and more consistent with medical philosophy, to say that alteratives are those medicines which operate mildly as evacuants, according to the dose in which they are administered, and to the disease they are intended to remove. Let this be illustrated. Calomel is a most potent evacuant when administered in a sufficiently large dose; it is then called a cathartic. When administered in a minute dose, so that no effect shall be perceptible from one day to another, but so that it shall eventually restore some deranged function to a healthy state, it is called an alterative. But this latter action is effected by altering the secretions, by increasing their quantity; so that, eventually, though not perhaps till several days, it exhibits all the characters of an evacuant by increasing the discharge from one or more organ. Again, it may be doubted whether all articles belonging to this class do in reality act, either slowly or rapidly, as evacuants; but it must be borne in mind, that, as disease approaches in so insidious a manner as not to be perceptible, when one organ is affected, some other, whose function is analagous to its own, is made to act as its substitute and perform its duties; so, on the other hand, health may be restored as gradually as it was lost, till the organic actions are equally balanced. When phenomena like these occur in the progress of a disease, and when the morbid state is removed by medicine acting imperceptibly for a season, we have good reason to conclude that the remedy operates upon one organ as an evacuant, while it produces a

contrary effect in some other. For instance; an individual may have chronic diarrhea, and, as is almost uniformly the case, a parched, dry skin, indicative of too little perspiration. A remedy may be here administered which will, in the course of a few weeks, without any alteration from day to day, restrain the diarrhea, and render the skin perspirable; here an excessive evacuation is moderated, and one too scanty is increased, and thus the remedy acts, at one and the same time, both as an astringent and an evacuant. Thus, then, an alterative differs, ultimately, in many instances in no respect from an active evacuant, save, only, in degree of activity, which is made to depend upon the dose in which it is administered; and although its operation is slow, it is none the less certain or effectual in doing either good or evil, as it is wisely or injudiciously prescribed.

In the class of alteratives may be reckoned all the "Panaceas," "Mixtures," "Pills," "Tinctures," and all nostrums that promise, by their sponsors, to cure all "humours," to purify the blood, and to cure all the diseases with which the race of Adam was ever afflicted. These medicines are generally pleasant to the taste, and as they are not very active, require to be continued for a long time; and, where the sale of the article is the chief object, the empiric gains his end, provided he contrives that his patients shall find a little hope in the bottom of each bottle.

A gentleman in this city had been, for sometime, rendered uncomfortable by a chronic disease, which had proved so obstinate as to baffle the best directed efforts for its removal. After availing himself of the advice of the

most eminent of the faculty, as well as trying the virtues of many nostrums, with which he made his acquaintance through the medium of the newspapers, he at last placed himself in the hands of a notorious quack, and who may with propriety be styled the Prince of Quacks. The patient continued to take the medicine, bottle after bottle, without any interruption for several months, till hope was nearly extinguished. One day he entered the "Doctor's" shop to protest against any farther continuance of the medicine; but the "Doctor" by his peculiarly persuasive powers, and by the most unblushing assurances, induced him to take the ninth bottle, at the usual price of five dollars a bottle. After he had retired, probably congratulating himself once more on the prospect of a speedy recovery, a third person who happened to be present, and who understood the secrets of the craft, remonstrated with the self-dubbed Doctor for such downright imposition.

"Ah, ha, Monsieur," says the knight of the pestle and pill box, "de most people in dis country be very foolish—dey will be imposed upon, and I may as well profit by their credulity as others. My medicine is parfaitly inert; it can do him no harm, and while he is amused with taking it and pursuing a proper regimen, time may cure his disease as it does others; and then I have the credit of working another wonder."

All medicines, however, of this class, are not inert; and such as do possess efficacy are indebted for it to some active, powerful, ingredient, whose character is concealed by some other article that obscures or covers its sensible properties. The virtues of calomel are tacitly acknowledged by its enemies, or rather pretended enemies; and

they practice the most perfect jesuitism in the composition and sale of their drugs. No one disputes the fact that there exists against this potent agent a wide spread and almost invincible popular prejudice; and this is used as a shield with which charlatans protect themselves in their crusade upon the credulity of the populace, a mask with which to conceal their base designs. They proclaim through the public papers that their medicines contain no calomel—no mercury—nothing of the kind; and if, perchance, it happens that chemistry detects their fraud, they, yet, with the most brazen effrontery deny it, and even when the metal itself is exhibited before their eyes, they persist in their assertions with the most barefaced mendacity.

A mechanic, in a region of country not more than a hundred miles from this city, was afflicted with a certain disease, to get rid of which he applied to a physician of eminence; he was accordingly furnished with a prescription which wrought a most perfect and expeditious cure. So well pleased was the patient with the issue of his own case, that he procured the same medicine for some of his acquaintances labouring under the same complaint; and a like happy result followed its administration. The operative was so well pleased with the effect of his medicine, that he procured the different ingredients of which the compound consisted, and learned from his Doctor the art of preparing the medicine for himself. He now set zealously at work; and his friends and acquaintances, who had tasted the benefits of his prescription, became his coadjutors; they circulated the reputation of what they called the newly dis-

covered remedy, others purchased it, and thus its fame rapidly extended. A name was now sought for the bantling, which was duly recorded in the newspapers of the day; it obtained an increased sale—its proprietor received orders from abroad, and he now at once left the workshop, and assumed to himself the name, title, and honors, of a Doctor. This Doctor has continued from that time, and with great rapidity, to accumulate wealth; he can now count his millions, and laughs at the credulity and gullibility of those who have contributed to raise him from obscurity to eminence, and from poverty to princely independence.

The medicine that acquired such celebrity is such as is almost daily prescribed by many physicians; and had been in extensive use in this, and other countries, long before the birth of this notorious quack. He had only given it another name, and added some new substances to it for the sake of blinding and misleading those who might seek to ascertain what were its ingredients, and in what consisted its remedial virtues. Another piece of deception, and downright imposition that he practised, was to declare in his handbills and advertisements, that his nostrums contained not a particle of mercury in any of its forms. From the effect of the medicine in various instances, there could be no reasonable doubt of the presence of this article; for its specific and peculiar character was manifested by profuse and obstinate salivation, which ceased and recurred, as the medicine was discontinued or resumed. And when the mercury was found by the chemists, and reduced to its metallic state, the maker and vender of the medicine denied its being a com-

ponent part of his nostrum. Arsenic was also found, but no acknowledgment was made that it was ever placed there by mortal agency.

The efficacy and value of this remedy in cases where its employment is indicated is not questioned; like every other good thing it is good in its place, and like every good thing too, it is capable of doing mischief when it falls into unskilful hands, or is injudiciously administered. It has one peculiarly bad effect upon the public mind—to wit: that of destroying confidence in so valuable a remedy as mercury, in its various preparations, by the injury it does when improperly administered.

A friend of the Author was induced by the patentee of this nostrum to make trial of it for a complaint with which he had been long afflicted; after being repeatedly assured that it contained no mercury, he commenced taking it, and persevered in its use till a profuse salivation occurred, which, with the consequent aggravation of the disease, so shattered the constitution that years will be required for its restoration. It seems hardly necessary to repeat, that, aside from the specific effect of mercury upon the salivary glands, there are many diseases of the digestive organs, in which it acts like a virulent poison, rather than as a salutary remedy. And, again, in those who have been unfortunately salivated, either from accident or necessity at some time long previous—it may be years—are rendered so susceptible to the action of mercury, that a minute, an almost inconceivably small portion of this substance, will reproduce the salivation.

Other nostrums that were said to contain no mercury have produced the specific effects of this remedy, as we

have repeatedly witnessed ; and, although other articles may, under some circumstances, cause a profuse flow of saliva, there is yet nothing that can cause that peculiar state of the system which results from the free use of mercury.

The conclusion to be drawn from the preceding argument then, is, that with regard to alteratives under the name of " panaceas," " mixtures," etc. inasmuch as there is great deception practised in their composition, there need to be the greatest judgment and discrimination used in their selection and employment. And as a knowledge of the articles is necessary to decide these points, and this knowledge is retained a secret within the breast of the proprietors, there is no certainty that benefit will result in a given case, but the chances are equal at least that mischief will ensue, from their employment.

6. *Diet.* Hardly any subject in regard to health has become more hacknied, in these latter days, than that of diet. Lecturers have arisen who have perambulated the country proclaiming, without reason, their dogmas to multitudes of greedy listeners, prescribing to them rules of eating and drinking, and setting to them limits, beyond which they are forbidden to pass. Books have been written, fraught with precepts of abstinence, and urging upon all, the robust and healthy, a regimen fit only for invalids, and indeed but a small minority of them. Whoever, when in the enjoyment of health, has allowed himself to be influenced by such contemptible quackery, has cursed the day, if his strength of constitution has enabled him to sustain the rash and unwise experiment, that he ever turned a deaf ear to the dictates of nature,

as indicated by the wants of the system—the demands of appetite. Many, and a vastly greater number than would at once be believed, have had their health impaired, their constitution undermined; and from being hale and hearty have become pale-faced, weak and emaciated, and incapable of pursuing their usual avocations till a return to the forsaken path has restored their former vigor.

Any cool observer who has witnessed the excesses and extravagances, the ultraism and fanaticism, of the last five years, cannot have failed to see numerous instances of their unhappy influence; and not the weak-minded alone have been brought under the sway of the impostor; but the strongest intellects, the most philosophical and learned among us, have been led away captive.

Nothing sooner impairs, and finally destroys health, however paradoxical it may seem, than overweening anxiety, and unnecessary efforts, to preserve it; and we believe we speak the sentiments of nine tenths of our profession, when we say, that every healthy individual who commences a system of dieting, is, sooner or later, rendered dyspeptic. We have never seen a person who commenced dieting in health who was not injured by it; and we have never seen a healthy individual recommend it to others. They who are most famous for holding forth orally, and through the press, on the subject of eatables, are confirmed dyspeptics; and like the drunken man who fancies any one else drunk, they prescribe their system, which, perhaps, is best for them, invalids as they are, to all with whom they chance to come in con-

tact. Why not, on the same prineiple, set any healthy man, one who never knew an hour's siekness, every hod-carrier, farmer, and meehanie, to taking glauber's salts or rhubarb? "The well need not a physieian;" and least of all a physieian who prescribes starvation as a universal panacea for prolonging, ad infinitum, the thread of human existenee.

We have alluded to appetite as a guide in matters of diet. Nature has given to man a diseriminating taste—a relish for her bounties—of whieh there is an ample supply for its gratification. And if nature has given an appetite, and supplied the most ample means for its indulgenee, it has also fixed the limits, beyond whieh, that indulgenee is incompatible with the well being of the system. While no ineonvenienee, or any greater ill effeets result from the gratifieation of the appetite for food, there ean be no impropriety in obeying its commands; but every man is blessed with reason suffieient to eonvinee him of errors in this respeet, and with will sufficient to restrain his desires. To say to a man that he shall not regard the promptings of nature within him, that he shall go counter to the dietates of appetite and the demands of the system, is the most utter nonsense, the merest quaekery; and they who assume to themselves the task of countervailing the operations of nature, are plaeing upon their own shoulders a fearful amount of responsibility. It might be expeeted that the unhappy results of their experiments, so often seen, in the emaeiated frames, wan eountenances, and hollow eyes, the feeble step and unsteady gait of their diseiples, would eonvinee them of the ruinous tendeney of their visionary

schemes; but after all, so wedded are these priests of starvation to their theory, so firmly seated are they on their hobby, that were troops of ghosts of the starved to come from another world, hardly would they be induced to return to reason and common sense.

Were it necessary, hundreds, nay thousands, of instances, might be enumerated, where the health has been impaired and irrecoverably lost, at those institutions, and in those regions, where learned professors have had an opportunity of lecturing, and where by the influence of their names people have been induced to follow their precepts; but not a single instance has ever come to the knowledge of the author in which even a well man has been made more well by weighing his food, or confining himself to bran-bread and vegetables.

A writer in Johnson's Medico-Chirugical Review, for Oct. 1836, says, "in periods of religious fastings, some persons, who are rigid in the observance of these, are always more or less afflicted with cough, and an affection of the breathing. We have for some years past been in the habit of attending many of the members of a sect, which is unusually austere in all its penances; animal food is interdicted among them, and now and then a rigid fast is exacted. Often have I had occasion to observe troublesome coughs, difficult breathing, and even bleeding at the lungs, induced in the more delicate of the devotees. Fortunately, in most cases, the troublesome symptoms were readily curable by the use of a generous diet and of tonic medicines."

In another place* we have discussed this subject

* The Philosophy of Living. No 77, Harper's Family Library.

more fully, and shown the influence of diet upon health; and as our object now is to show its effect upon disease, we forbear further remark, although to say less was impossible.

If a system of dietetics can be so prolific of mischief in health, so if applied with judgment, it may be made one of the most powerful means for the removal of many complaints that would otherwise baffle all the art and skill of the profession. And if many healthy persons are injured by too abstemious a diet, so are many also injured by the other extreme as well in disease as in health. But it by no means follows as a necessary consequence, that an abstemious diet is the panacea for all complaints of the digestive organs, that all are to be cured by a purely vegetable, or animal diet, or by a strict confinement to the use of bran bread and cold water.

The constitutions and temperaments of individuals are vastly different; so that while one can subsist, and enjoy perfect health, on vegetables, another requires a proportion of animal food; and while one may indulge in the use of stimulating drinks with perfect impunity, another cannot take them in the smallest quantity without experiencing some ill effect. Thus it is in disease; the same peculiarities are manifested then as in health, although they may be increased, diminished in degree or altered in their characters. Were this not the case, we might bid farewell to all scientific investigation, to all pathological research, and to what have been called, and fondly believed to be, improvements in the healing art. We should then have only to say that such an one has

dyspepsia, and that abstinence is to cure him; or that a vegetable diet is his only remedy; or that he has no hope left but in a strict adherence to the use of animal food, or by confining his indulgences in gastronomic matters to the notorious bran bread.

Diseases of the digestive organs assume such a variety of forms, they manifest such a multitude of appearances in different individuals, and even in the same individual, that the wisest medical philosophers, the best practical physicians, are obliged repeatedly to change the diet during the treatment of a single case. The actual condition of the stomach, in the complaint denominated dyspepsia, is by no means the same in all cases; one person may not be able to digest meat, another can eat nothing but meat; one will eat sweetmeats, sugar, molasses, and the like, while another cannot bear the smallest quantity of any saccharine substance. The ill effects of an exclusive diet, as prescribed by quacks, may be illustrated by stating briefly a few examples; but it is necessary to premise that the popular belief is that dyspepsia is an entity, almost a tangible thing, and always the same identical affection in all cases. Every practical physician knows the importance attached, by people in general, to the name of a disease; and no matter what it is called, no sooner is the disease christened than they seek a specific for it. And thus it is with dyspepsia; no matter whether the stomach alone is affected, or whether the adjacent organs are diseased, or whether all are involved in the disorder; it is quite sufficient if the complication is styled dyspepsia. Specifics are now sought after with the greatest avidity.

A gentleman who had been somewhat inclined to indulge in the luxuries of the table, and whose occupation was sedentary, found himself affected with much gastric derangement. When complaining one day to a friend, the latter replied, "why you have got the dyspepsia; you must eat meat, and nothing else, and drink plenty of brandy and water. Dr. A. cured me by this plan in a very short time." The Doctor spoken of was a notorious empiric. However, the friend's advice was taken, and consequently the disease was aggravated till it became alarming. After a long course of suffering, this case was finally cured by a restriction, for several weeks, to a purely farinaceous diet.

Another individual who had been suffering a long time with deranged digestion, had employed many physicians, and more quacks, had taken nostrums of all kinds, and in almost all quantities; at length he resolved to try a system of dieting, and accordingly commenced with vegetables. He was soon worse than ever, and continued to grow worse while he continued this kind of diet. A change to a diet composed of tender animal food, and stale bread alone, with a small quantity of brandy and water soon restored him to complete health.

Another person affected in a similar manner to the one last mentioned, and to appearance as much so as ever one case is like another, was compelled to restrict himself almost exclusively to a diet of milk.

It must be understood that there is no medicinal virtue in any kind of diet here mentioned; the chief benefit resulting from either consisting in its being easily digested, thus affording nutriment to the body, while the

organs of digestion, by not being irritated, or disturbed, in their operations, are allowed to recover their healthy tone and condition. Although the good qualities of diet are rather of a negative, than positive, character, it is nevertheless true that the body as a whole, in all its parts, solids as well as fluids, may be greatly influenced, and the organic actions modified, by any particular diet, that may be persisted in for any length of time.

There is one article of diet, which, from the extravagant praises it has received from certain quarters, and from the high estimation in which it is held by popular consent, deserves notice by itself. But this is not the only reason that gives it a claim to our special attention at this time; it has the power, when indiscriminately employed, of doing that mischief which neither its friends or enemies, or both combined, can ever remedy. We allude to bread made of unbolted flour—bran bread.

It is a fact, well known to thousands, that this bread, in a costive habit, will almost invariably produce a contrary state of the bowels. It does this not by any medicinal property, but by the mechanical irritation it excites in the digestive canal—the whole length of the stomach and bowels. But however its specific effect is produced, whether by mechanical or other means, the fact is beyond question, that, in healthy individuals and in costive habits, when disease is present, it operates as a laxative. How much greater then will be its effect in those cases where diarrhea is the most troublesome and prominent complaint?

A most melancholy and interesting instance of the pernicious effect of this bread, in a case of the latter charac-

ter, came recently under the author's own observation; and as the unfortunate victim was his most intimate and estimable friend—the late lamented Prof. Averill of Union College—he takes this occasion to pay a passing tribute to his memory.

Prof. Averill, and the writer of these pages, were fellow students when preparing for college, in the delightful village of Stockbridge—now rendered classic by the genius of Miss Sedgewick—where an intimacy and friendship commenced, which increased, and struck deeper root as they knew each other better. They entered the same class in college together, had their examination at the same time, and while the author continued a member of college were room mates. After our connection with college had ceased, a correspondence was as punctually kept up as circumstances would permit; and immediately after his graduation, he became an instructor in the institution where he had, for four years, been receiving instruction. As a student, Averill was not excelled; and it is no disparagement to others to say that he was not equalled by any member of his class—for at his first entrance he stood at its head, and when he graduated there he yet remained. As a scholar we have never known his equal; no matter what the subject, or however arduous the task he undertook, his comprehensive and powerful mind overcame the greatest difficulties. As a companion Averill was beloved by all who knew him—by the learned and unlearned, old and young, and by people in all conditions of life;—he could draw from his own resources something agreeable, interesting, or instructive to all. As a friend he was most sincere,

single hearted, and devoted ; any thing in his power to do, was done cheerfully ; his friend's welfare was his own, and he never tired in his efforts to promote it. In his labors as an officer of college he was unwearied, and strove most zealously, and beyond his strength, to advance the interests of the young men committed to his charge. The hundreds who have enjoyed the benefits of his instruction, and his wise counsel, and who were admitted to the privileges of his friendship, will long cherish his memory with gratitude and admiration ; in their hearts he has built for himself a monument to be, of all others, the most highly prized. Worn out with fatigue, anxiety, and toil, he left the scene of his literary career to seek repose, to recruit his health, and to enjoy the affections of his friends, in his native town on the borders of New England ; and there he found repose indeed—for he sleeps amid the romantic scenery of those hills once so dear to him, and upon which he so delighted to gaze—and we had almost said he fell a victim to quackery.

During the warm season of each year, for several years previous to his last illness, Prof. Averill had been annoyed by a complaint of the bowels, which, agreeably to popular custom, he had called dyspepsia, and, in accordance with the fashion of the times, he commenced the use of bran bread.

Strange indeed it is, and inexplicable, that a man of his intellect, of his peculiarly philosophical and investigating mind, should be thus led astray ; but he had dyspepsia, or at least a disease so named, and bran bread was the sovereign remedy. This was the only bread he used

for a long time; and often, when he visited where a supply of the bread was not to be procured, he carried a quantity for his use. The last six months of his life he had a constant and uncontrollable diarrhea; and yet, so completely infatuated was he in regard to diet, that he ate bread made of no other than unbolted flour. There need be little wonder that his complaint was unchecked, that it was obstinate, and persisted in its progress in spite of occasional medical treatment; for one principal exciting cause was in continual operation, producing its legitimate result. And thus his disease continued gradually to undermine his strength, and waste his flesh, till he was but the shadow of what he once was—till he became emaciated to a mere skeleton; nevertheless he persisted in the use of bran bread, and did persist in it till almost the last day of his existence.

Such was the nature of Prof. Averill's disease, and such the nature of his diet, and the evidence in regard to his case brought before our own observation, that we have no hesitation in declaring that his disease was aggravated, and his death hastened, by the use of bran bread. We may not be far from a right conclusion, then, when we say that no one system of diet is adapted to all diseases of digestion, nor to all cases of disease that may go under the same appellation; and that, least of all, itinerant lecturers, or dyspeptic book-makers, should be countenanced in their efforts to extend their quackery, by introducing it into public notice and popular favor.

I have thus passed briefly over the most important plans of medical treatment, for diseases of the digestive organs, that are pursued by the most prominent empirics

of the present day ; to have entered into detail, and discussed the merits of the different articles belonging to each class, would have covered more ground than was the author's original intention ; and besides, to establish a general principle, with reflecting minds, is more desirable than to enter into minutiae.

Note.—Since these pages were written, Prof. Reed of Schenectady has published a memoir of his colleague, Prof. Averill, under the title of a "Discourse," of which the "New York Review" of January speaks, in the following terms. "Professor Reed in his brief, but beautiful piece of biography, has well discharged the office of friendship, and has given us a chaste and manly portraiture of a character that deserves to be remembered. All who knew Prof. Averill will thank him for the faithfulness of the delineation."

CHAPTER V.

ORGANS OF RESPIRATION.

The lungs, or, as they are called in the inferior animals, 'lights,' are the only organs of respiration, and communicate with the atmosphere by the trachea, or windpipe. They have the form of an irregular cone with the base looking downward, and are situated in the chest or thorax. The lungs are divided into two lobes, the right and left, and have the heart lying between them.

The trachea is about four inches in length, and is minutely ramified as it enters the lungs to form the air cells. It is lined by a mucous membrane, which is extended throughout all its branches into the substance of the lungs.

The external surface of the lungs is covered by the pleura, a delicate serous membrane, which is reflected so as also to line the whole cavity of the chest. In their natural state the lungs fill the entire cavity of the thorax, so that that portion of the pleura which covers the lung, and that which lines the chest, are in contact with each other, and are kept moist, and lubricated, by their secretion of a fluid designed for this special purpose.

Besides the mucous membrane which lines the whole internal structure of the lungs by forming the air cells, and the serous membrane, the pleura, which covers their external surface, the other tissues that are combined in

forming the respiratory system, are the fibrous tissue, the muscular tissue, cartilage, blood vessels, including veins and arteries, lymphatic glands and vessels, and nerves.

To enter into a description of these is unnecessary; it is sufficient to say that they differ from each other materially in their anatomical characters, and in the several parts they perform in the animal economy. And yet these tissues, so different in their structure and function, are all combined to form a whole—the respiratory system—and although each is but a part of the whole, nevertheless, each is liable to its own peculiar diseases, as different in their nature as each tissue is different from the other tissues in its anatomical character, and physiological office.

The function of the lungs is respiration; and by this act, the blood, as it returns to the heart, to be again distributed through all parts of the body, is changed, by the action of the atmosphere in its passage through the lungs, from a dark purple, to a scarlet color, and is thus purified and fitted for the uses of the system.

1. *Diseases of the lungs.* Dr. Good enumerates upward of forty diseases that are peculiar to the respiratory system; and among this number there are some, the most formidable, the most obstinate, the most certainly, and the most extensively, fatal of any that afflict our species. Among so many there must necessarily be a great diversity of character even when they appear singly; but seldom, indeed, is it that one tissue remains for any length of time alone affected. Others, the most adjacent, or the most analogous in structure or function, or the most closely allied by nervous sympathy, soon become involv-

ed; and they again propagate disease in those tissues most susceptible to their influence.

A disease in one tissue does not wear the same appearance, nor does it retain the same character throughout its progress, that it at first exhibited; it is in fact so changed, so altered in its very nature, that it demands a modified, or perhaps an entirely different, treatment. In thus adapting remedies to the different stages of disease; in knowing the actual condition of the organs affected—by the state of the patient—the history of his case—and an acquaintance with the nature of the disease under which he may be laboring—consists the skill of the physician; here is shown the triumph of our science. It may be that this skill does not avail to effect a cure; yet it may be sufficient to predict the ultimate result; and if it cannot restore the father or the mother to their weeping, heart-broken children, it may yet assuage the pangs of suffering, prepare the patient for his final exit, and ease his passage to the other world.

The term *inflammation of the lungs* would seem to imply, and is generally understood to mean, by those who are not well acquainted with the subject, a disease which is always the same, both in its character and the parts affected. But, than this, there can be no more palpable error—no greater misconception. Each of the tissues named as constituting a part of the respiratory apparatus, may be separately affected, although not usually so observed in practice; the terminations of the disease will be entirely different, and yet in each tissue it will be inflammation. The character of this disease depends upon that of the part affected by it; and its results

will be entirely different, although it is still inflammation. Thus, in inflammation of the mucous membrane lining the air passages and air cells, there may be an increased discharge of the natural secretion; and this may be so abundant as to relieve the diseased part, and perhaps remove the disease from it. If the substance of the lungs —the parenchyma as it is called—is inflamed, the disease may terminate in induration of the portion of lung diseased, thus rendering it completely impervious to air, and making it useless in respiration. If the serous membrane is inflamed—the membrane covering the lung externally —the disease may terminate by an increased discharge of a thin watery fluid, its natural secretion, thus constituting dropsy of the chest.

And thus the same reasoning might be extended to all diseases of the respiratory system, each having some peculiarity in its different stages, that would render some change, or modification in its treatment, of the greatest importance.

Consumption is a disease that is almost as certain to move on to a fatal termination as that the sun will continue to perform his rounds; and yet by proper treatment the fatal day may be greatly protracted, the strength preserved, and the disease kept at bay. And if science and skill, judiciously applied, can be of such avail as to predict, and to defer, a fatal disease, ignorance and empiricism, on the contrary, can neither foresee the one nor accomplish the other.

Diseases of the respiratory organs, or rather of the organs contained in the chest, are of a diametrically opposite nature, and may require a totally different treatment;

although to an empiric they may seem exactly similar, and appear to demand the same remedial measures. A person, for instance, experiences great difficulty in breathing, attended with cough, and hurried respiration on any sudden movement; an empiric, a vender of nostrums, would consider these symptoms to indicate clearly some "lung complaint," the nature of which would be incomprehensible to him, but at any rate to be cured by his most precious specific. Every well informed physician, on the contrary, would carry his investigations farther; and he would find that, of two cases, pronounced by some quack to be exactly alike, and both easily cured, the one would be an incurable and organic disease of the heart, and the other would be the first stage of tubercular consumption.

The better to illustrate the effects of quack remedies in diseases of the lungs, and of the respiratory system, we have thought it expedient that they should be classified according to the mode of their operating, as was done when speaking of diseases of the digestive organs; each remedy can then be ranked according to its action in the system, and the propriety of its employment thus determined.

1. *Cathartics.* Many observations that were made in regard to the effect of cathartics upon diseases of the digestive organs, are equally applicable to complaints of the organs now under consideration; our remarks therefore will be of a less general nature, and pointed at the peculiar influence of remedies upon certain diseases. In affections of the lungs, cathartics, as a general thing, are less useful than in diseases of the alimentary canal; and,

on the other hand, they are less likely to do injury, except in diseases of long standing, and where the constitution has become greatly enfeebled.

The mucous membrane, forming the air cells in the lungs, has had its extent of surface variously estimated; but, with some probability of approximating the truth, we may compute it to cover a surface equal to 20,000 square inches. From this membrane there is constantly going on an exhalation, or transpiration, of a vapour similar to that which we have noticed as being exhaled from the skin. So intimate is the sympathy between the mucous membrane of the lungs, the skin, and the lining of the alimentary canal, that when the function of secretion, or transpiration, is increased or suspended in either, the same function is performed invariably by one or both of the other organs. Thus when a diarrhea is the primary disease, the skin will be found to be dry and husky, and in a parched condition; if the skin is excited to undue action the diarrhea will be checked, and if profuse perspiration is long continued, costiveness may be induced. The sympathy of the lungs is analogous to this; when the secretion from the lining of the alimentary canal is increased, the exhalation from the lungs is diminished, and it may be so scanty that respiration shall be performed with pain and labour; and if perspiration is checked, the balance of circulation is lost—too great a quantity of blood is thrown upon the lungs, and they endeavor, by a natural process—that of increased exhalation or secretion of mucous—to free themselves from the unnatural burden.

From the preceding facts the following consequences result.

1. Cathartics, injudiciously administered, in affections of the chest, have a powerful tendency to determine the blood from the surface of the body to the internal organs. The lungs being, as is often the case, predisposed to disease, have thus an amount of labor imposed upon them which they are, by no means, able to accomplish; and that disease, to which they are most predisposed, becomes fully developed. Few practitioners, indeed, there are, who have not seen cathartics lend a potent agency in the production of acute inflammation, as well as in that dreaded disease, pulmonary consumption.

2. When the lungs are already laboring under disease, cathartics prevent the sympathetic action of the skin, by which the lungs are most permanently, and most naturally, relieved; substituting, in its stead, diarrhea, which may also prove troublesome and obstinate. The exhalation and expectoration — the process which nature adopts to effect her own cures—are thus suspended; and, instead of being made better, the disease is greatly aggravated. In all affections of the lungs, attended with a cough, the best medical writers and practitioners insist upon the expediency of using remedies to make the cough loose; or in other words, to promote and increase the exhalation from the lungs. And every individual, who has ever been afflicted with a cough, knows the relief he has experienced by a free expectoration; and, when this cannot be obtained, by a free and perspirable state of the skin. He who rashly administers a remedy, that operates contrary to reason, experience, and the dictates of nature, knows little of the laws that govern the human system, and cares still less about

the responsibilities he assumes in constituting himself a medical adviser. Physicians who have observed for themselves, and who have rightly appreciated the effect of remedies, must have now and again seen a comparatively easy respiration in disease of the lungs, changed, by the operation of a cathartic, into a process the most difficult and laborious; and in so great a degree is this sometimes witnessed that the patient is threatened with immediate suffocation. These are indeed comparatively rare cases; but they serve to show the tendency of cathartics, in analogous lung affections, in a degree proportioned to the character of the disease, the length of its duration, the strength of the patient, his constitutional peculiarities, and other circumstances exercising a controling influence. But unfortunately for the credulous invalid, and his too yielding friends, these circumstances are not taken into account by the designing, mercenary empiric. Caring nothing for his own reputation, and much less than nothing for the interest and advancement of science, he affirms, with the dogmatic earnestness characteristic of his tribe, that his "pills" are a universal remedy, an absolute specific; and that all diseases of the lungs, consumption not excepted, are made to disappear, like frost before the morning sun, by their all-pervading and all-conquering medicine. Not contenting themselves with their own assertions, or, suspicious of the credulity of their *customers*, they endorse their stories of wonderful cures with multitudes of statements certified by respectable names. We shall not call in question the honesty or sincerity of those who so readily certify to their having been cured of some particular disease, by

some particular remedy, the like of which was never known, but whose virtues ought to be proclaimed through the whole inhabited world; for their statements are made with the utmost candor, and with the fullest belief that they are religiously true. But their knowledge we do mean to question; nay, we mean to say that nine times in ten they have no knowledge in relation to the disease of which they certify to have been cured. They desire to benefit and relieve suffering humanity; and for this god-like benevolence they deserve all praise; but if they know to what use their certificates would be perverted, if they knew the eagerness with which empirics seize upon every thing said in their favor, and throw it out as a lure, a trap, a bait, with which to catch their prey, they would, assuredly, be more chary of the aid they unwittingly afford in the destruction of their fellow men. The ignorance of the kind-hearted individuals of whom we are speaking, is not their fault; and therefore let us hold them in a measure blameless. Diseases are so similar in their nature, so analogous in their external characters, that it is not surprising, when the most enlightened and experienced are uncertain and in doubt, if one, completely uninformed, should be led into error; and his mistake is the more easily committed if a designing impostor can once entangle him in his wiles. An individual may have a cough, some shortness of breath, and many other symptoms simulating an incurable disease of the lungs, of which some one of his acquaintances may have died. He applies to a notorious quack, and relates his case, and also his fears that he may not recover; and the quack unhesitatingly pronounces him to have consump-

tion firmly and fully fixed upon him—but, to the unspeakable comfort of his patient, he adds, that his medicine will most certainly effect a cure. By the help of his own fears, his imagination, and the quack's assurance, the poor man is really made to believe that he has consumption, that he is verging toward the grave; that he truly feels the cold hand of death, and its unrelenting grasp, fastened upon him. His disease, in fact, is not consumption, nor any thing that resembles it except in appearance; it is cured, and cured too, by the empiric's nostrum. The patient, happy to have retained his "mortal coil," and grateful to be permitted to live a little longer on this side the grave, in the fulness of his heart prepares a certificate, or signs one already prepared at his hand. It is the appearance of the disease that deceives the patient, and may be, also, the charlatan; many complaints possessing the same symptoms in common, and yet being entirely unlike in reality. A kind-hearted man who had been cured of some complaint by a quack remedy, called to see a sick female friend, and urged her to use the same remedy that did him so much good; and so determined was he on her making trial of it that he carried a box of pills in his pocket. In the midst of their discussion of the merits of the medicine, the lady's physician was announced, and soon entered the room. The good neighbor immediately opened his battery of pills, and insisted that the patient should forthwith commence their use; he was sure, quite sure, positively certain, that they would cure her, for they had cured him of a disease exactly like hers. The Doctor stared, and asked him if he was certain that their diseases were alike.

"Yes," says he, "precisely; and if she will take the medicine she will get well, as I did."

"If your disease was like hers," said the Doctor, "you have been the *mother* of a large family."

Hardly a day elapses that physicians, in ordinary practice, do not hear people tell of having had a disease exactly like that which some other person has; and they are always sure of it, perfectly confident, although the diseases may be as unlike, as black and white, light and darkness, or any two opposites in nature.

There is, probably, no hazard in saying that diseases of the lungs are generally as speedily, and certainly fatal, as those of any organ in the body; and if this be the fact, it is, therefore, the more important that no time be lost in meeting them with prompt treatment. A disease is much more readily cured at its commencement, or during its first stage, than at any subsequent period; and he who does not face the enemy at the door, and at once repel him, will find it a much more difficult task to expel him from the house after he shall have entered and taken possession. And thus it is, that by using quack remedies of a cathartic nature in affections of the lungs, if no positive injury is done by the action of the remedy, the unfortunate sufferer is led on by the delusive hope—an ignis fatuus—that he will ultimately be restored to health, till the line is passed that he can never recross—till a step is taken that can never be retraced.

A young lady of this city, after exposure to cold, was affected with cough, shortness of breath, pain in the side, and all the more prominent symptoms that indicate serious disease of the lungs; she used the proper remedies

and in a few days enjoyed again her usual health. In about six weeks after a second exposure there was a recurrence of the first complaint; the symptoms were as analogous at this time to those previously exhibited, as are ever seen under like circumstances; and there is every reason to believe that the same, or a similar, plan of treatment would have again succeeded in removing the complaint. But by some strange infatuation of the mother, who ought to have known better and acted differently, and whose mind had been taken possession of by an idea that a certain quack remedy was a universal panacea, insisted that her daughter should take the "infallible specific pills." The medicine was employed, and the patient grew worse; and when the friends remonstrated, the mother insisted that the pills would eventually effect a cure. Her confidence in the remedy was fortified by the multitude of certificates put forth in the newspapers, to some of which were attached respectable names; and the puffs, written and paid for by the proprietor and venders of the pills, had no little influence with the good mother in causing her to persist in her obstinacy. The affectionate and credulous woman really believed that the certificates were all genuine, that those who gave them had been cured of the diseases with which they so solemnly proclaimed to the world to have been afflicted; and she had the most implicit faith that the physician's skill, and *apothecary medicine*, were not half so well adapted to her daughter's case, as the vaunted and far-famed "pills." And so the pills were continued—the patient continued to be ill—and to grow worse; till, at length, her obstinacy equalled, and over-

matched that of her mother. The pills were now only taken by her, to be thrown into the fire. Finally, the affection of the mother prevailed over her firmness; she consented to call the family physician, although she still declared to her daughter that the pills would cure her if she would but *take enough*.

"Mother," says the poor girl, "how many more will it take to *cure* than to *kill* me?—the latter is almost accomplished."

Suffice it to say that a judicious course of medical treatment was commenced, and after the lapse of two months, the disease began to yield. If a proper course had been adopted at the commencement of this young person's illness, there is every prospect, that, instead of months of suffering, at the hazard of a fatal termination, a few days would have been ample time to have wrought a perfect recovery.

Perhaps the reader, particularly if he be predisposed to pulmonary complaints, may be induced to inquire whether or not consumption can be cured? This query involves points that require too long a discussion to be settled in this place; nevertheless, it may be briefly answered in a manner satisfactory to most minds.

Consumption is a name vaguely applied to a number of diseases possessing some external characteristic in common; yet so widely different are they in their seat and nature, that they by no means always affect the lungs, and instead of these organs being ulcerated, as in genuine consumption, they are found, on dissection, to have no ulceration whatever. If an individual be only emaciated, if his strength fail, either with or without a cough, or if

there be any one symptom that is generally known to be prominent, or to be present, in consumption in conjunction with emaciation, the disease is unhesitatingly pronounced consumption by the non-professional observer. And if an invalid recover after once having been pronounced to be in a "decline," or to have consumption, the cure is considered little short of miraculous, no matter by what agency it may have been effected, whether by some quack remedy, animal magnetism, homœpathy, allopathy, or no pathy at all. Ulcerations of the lungs have unquestionably got well; or if the reader choose, they may occasionally have been cured; post-mortem examinations, in a few instances, seem to establish this fact. But these cases of cure are the anomalous and rare efforts of nature, rather than the triumphs of medicine; they serve to show the imperfect and uncertain state of our profession, and the greater need there is of perseverance and assiduity in its cultivation and improvement. By seeing what may be done, and what is done as it were spontaneously, we should be stimulated to greater diligence in our endeavors to alleviate distress, to mitigate suffering, and prolong the space of human existence. And he who studies to flatter one, laboring under a disease necessarily and uniformly fatal, with the false hope of a recovery; who aims to delude and cheat the sufferer till the lamp of life is burnt nearly out—who lures him on, step by step, till his hold on life is almost gone, hoodwinking him till about to step into the grave that has been preparing for him; and, excluding all consideration of another world, and the fate that awaits him there—is little better than one who assaults a traveller on the high-way, or who robs his neighbor's house by night.

It may, we believe, with safety be said that pulmonary consumption, after having advanced to the ulcerative stage, is, in the present state of medical science, an incurable disease; and all pretensions to the contrary, all boasted specifics, all vaunted nostrums, are but as a plank thrown to a drowning man, when dashed and hurried along by a furious torrent.

Previous to the stage of ulceration, consumption may be, as it often is, prevented, even in those who are most predisposed to it, both by temperament and inheritance; but there is no one article, no particular remedy, that is omnipotent in the prevention of a disease that singles out for its victims the fairest, brightest, and most intellectual of our race. But this, like all other complaints for which medical men are called to prescribe, is to be treated on scientific principles; and, therefore, modifications of treatment are found to succeed, as various in their character as the variety of constitutions and temperaments in which the disease occurs. All quackery and humbug in relation to the cure of consumption may be at once discarded; for they who expect that to be accomplished by blind and ignorant empiricism, which enlightened science, applied by philosophical principles, fails to perform, are sure to meet with disappointment proportioned to their unfounded hopes.

2. *Emetics.* Articles of this class are used, probably, the most extensively of any other for pulmonary complaints, both by empirics and by members of the profession. They are not always, however, given in the quantity sufficient to cause vomiting; but are administered in doses so small as to increase the secretion from the

membrane lining the lungs. The effect of emetics generally, when judiciously employed in diseases of the lungs uncomplicated with affections of the stomach, is most salutary, whether the act of vomiting be induced or not; and so, too, on the other hand, when improperly employed, they possess equal power to do mischief.

We have stated, in a previous page, that the heart is situated in the cavity of the chest, between the two lobes of the lungs. This is an anatomical fact, which, with the relations existing between these two organs, is perfectly unknown to the empiric; or, if known, not regarded in the administration of his nostrum.

Asthma is a name applied by the ignorant to a variety of diseases possessing one characteristic, prominent, symptom in common; and that is, difficulty of breathing. Whenever this symptom is present, no matter what the disease may be in fact, it passes under the denomination of asthma; and therefore the remedies are addressed to the name, rather than to the morbid condition of the organs. This name is used very much in the same manner, and means in truth much the same thing when applied to disease, as the word *sin* when employed to denote all kinds of wickedness. *Asthma* is used to denote all errors of action of the heart and lungs, and *sin* to denote the errors in the life and conduct; and yet there are many species included under these two generic heads. Sins are as multitudinous as are the conceptions of the mind of man; and asthma is the result of any cause that obstructs the circulation of the blood through the lungs. The principal organ in the circulation of the blood is the heart; and this being subject to frequent and various affections

that destroy its activity, force, and power, a congestion of blood, therefore, takes place in the lungs, closing the air cells, and making it difficult to inhale sufficient of the atmosphere to perform the functions of life. This effect is as easily comprehended, as that a stream, dammed and obstructed in its course, should fill its channel and flow back towards its source. Post-mortem examinations have made us acquainted with the fact, that a great majority of asthmatic affections have their seat in the heart or its appendages, that they are dissimilar in their nature, but that most consist in alteration, a change of structure in the organ itself, and are therefore incurable. In many of these cases, it is useless to employ active remedies with the hope of effecting a cure; for instead of seeing our anticipations realized, we shall meet with disappointment. Lobelia was first introduced to the notice of the profession for its agency in the cure of asthma; or, in other words, for the removal of difficult breathing—impeded respiration. But farther than this we are not informed; we are yet ignorant whether the disease that was attended by this symptom, was located in the heart, or lungs. Supposing, however, that all cases of impeded respiration were the result of one and the same cause, and this cause itself consisting in some mysterious influence, physicians as well as empirics have continued blindly to administer lobelia, and other remedies of a like nature. The efficacy of this drug, in cases to which it is adapted, is not denied or doubted, nor need it be questioned; and, on the other hand, it is just as certain that no one, who is not intimately and thoroughly acquainted with the operations of the respiratory organs in

health, and their derangement of function in disease, and changes of structure as exhibited under the dissecting-knife—in short, no one who is not well versed in medical science—need hope to prescribe for affections of the chest with any prospect of success. Diseases of the respiratory organs are so obscure, notwithstanding all the light that has been thrown upon them by improvements in our science, that the nicest discrimination is necessary in their treatment; and few, indeed, there are in the profession, who feel and appreciate the responsibilities resting upon them, who have not found themselves, like a mariner without a compass, at a loss what course to pursue.

Doubt and uncertainty are increased by a class of diseases yet to be named—and those are aneurisms, or dilatations of the larger blood vessels connected with the lungs and heart. This disease may also cause a difficulty of breathing; and may be, as it often is, called asthma; and one of limited experience and knowledge, and certainly one who possesses neither, would be unable to recognize, and not very likely to suspect, a complaint of this peculiar character. These latter diseases, and the organic affections of the heart, often prove suddenly, instantaneously fatal, by a slight cause, such as coughing, sneezing, a jar of the body by a mis-step, mental excitement, depression, or agitation. And we ought always to be suspicious of these complaints whenever asthma is present, no matter what circumstances indicate the contrary, and no matter whether a physician or an empiric deny its existence; for a sudden death, and subsequent examinations, have often afforded the clearest demonstrations of the most grievous and lamentable errors.

The violent straining, and often spasmodic action of the muscles attending vomiting, produce greater agitation in the system, and are greater obstacles to a free circulation of the blood, than either of the causes of sudden death just mentioned; and therefore they are, *a fortiori*, likely to prove more speedily fatal.

With these facts staring us in the face, we must be at once convinced of the absurdity and ill effects of the practice of indiscriminately employing emetics, where they even seem to be indicated, and absolutely necessary; and we see also the utility of a perfect acquaintance with anatomy, with the operations of the organs in health and disease, as well as the comparative value of science and ignorant assurance.

3. *Sudorifics.* To this class may be considered as belonging all those articles that increase the exhalation from the skin. The general character and effects of these remedies having been considered when treating of the diseases of the digestive organs, they may therefore be passed over in this place by simply referring the reader to that part of the volume.

It will be recollected that there are two general characters, of a diametrically opposite nature, belonging to sudorifics; the one is stimulant, possessing the power of exciting the action of the heart—of increasing the vigor and rapidity of the circulation. The other has a debilitating, depressing tendency; so that while the former would elevate the pulse from eighty to ninety beats in a minute, the latter would reduce it to seventy; thus in one case elevating the pulse above, and in the other reducing it below, the healthy standard. In proportion as the cir-

culation, which is indicated by the pulse, is made to deviate from a state of health, in a corresponding degree do the functions of the different organs fail to be performed as health requires. Stimulants, even if their action or effect be but temporary, produce a condition of the system analogous to inflammation; and if their effect be permanent, or too long continued, actual and violent inflammation may be the result.

Nearly, if not quite, all the diseases of the respiratory system are, more or less, of an inflammatory nature; and this is the more manifest, *generally*, in proportion as the system is affected by fever. Sometimes, however, extensive changes take place in the organs, when the disease makes its approach insidiously, and as it were by stealth; and these changes are the result of an inflammatory action so silent in its commencement, and so gradual in its progress, that it is not revealed till too late for a remedy. However violent may be an inflammatory disease, or however silently it may make its inroads and work its ravages in vital organs, a stimulant administered when the fire is smothered, but not extinguished, will cause the disease to break forth with fearful energy. We see this effect when hot slings, or other stimulating drinks, are administered in severe colds attended with a cough, pains in the limbs, chest, or head. The person is, at such a time, laboring under an affection of the mucous membranes of an inflammatory nature; and a single dose of a stimulant, a small quantity of hot punch, or hot sling, is oftentimes quite sufficient to cause an excitement that bleeding, and the most active treatment, is required to allay. Pleurisies are frequently induced by the popu-

lar but erroneous notion, that bad colds are to be cured by a stimulating remedy that will produce a "sweat." The perspiration, in such cases, is beneficial, but the means are decidedly improper; inasmuch as if they do not excite perspiration, they aggravate the disease they are intended to cure.

A great proportion of those who die from consumption, date their illness from the time they took a severe cold. They say, and with truth, that their complaint was at first nothing but a cold, and that in spite of all they could do it continued to grow worse; and when it is ascertained what remedies were used, they will, in a great majority of cases, be found to have been of a stimulating character.

Not only are stimulants improper at the commencement of an inflammatory affection, but are equally injurious during any stage of its progress. Consumption is decidedly a disease of inflammation. It is, according to modern investigations in morbid anatomy, an inflammation and ulceration of tubercles in the lungs, which are solid roundish substances, of a size from that of a grain of wheat, or smaller, to one many times larger. Induration of the lung, a change of its structure, by inflammation, into a state impervious to air, constitutes what Laennec denominates "dry consumption."

The many syrups that are recommended by the kindness of friends, are rather more likely to do injury than to produce any good result. They contain, generally, more or less of stimulating ingredients; and, the sugar being added, it becomes necessary that something should be done to prevent fermentation, that it should not be-

come acid. Therefore it is that all syrups, without exception, contain a proportion of alcohol; and no matter what assertions are made to the contrary, by the quack, or by the affectionate friend, while the laws of chemistry exist, syrups containing saccharine matter will ferment, unless alcohol be an ingredient. From one fourth to one eighth part of alcohol is necessary to prevent working or fermentation; and this proportion of a dose of these medicines, is quite too large a quantity for one laboring under an inflammatory affection of the organs of the chest. When syrups are prepared by empirics on a large scale, to be sent to different and distant parts of the country, to prevent loss by preserving the medicine, a much greater quantity of alcohol is necessary. And a combination of articles thus prepared, that may be proper, and perhaps the best of any thing that could be prescribed, are, by the addition of the alcohol, changed in character and rendered decidedly injurious.

All the drops, tinctures, elixirs, and nostrums of a like character contain a proportion of spirit; it may not be used under the form of pure alcohol, and therefore it is denied by the inventors, venders, and proprietors, that *alcohol* enters into the compound. But all assertions to the contrary notwithstanding, a chemical analysis would show the thing itself to be there, although it may have gone in under the name of brandy, gin, rum, or some other appellation.

The only guide in the administration of medicines of all kinds, and in all diseases, should be a physician—one regularly and thoroughly educated, and possessing all that is important in aiding him to arrive at right conclu-

sions when health and life are the questions to be decided. It seems that no further argument is necessary to enable the reader to decide for himself in relation to the subject before us; still, it may be possible, that, like others of our fellow men, he may have his mental vision so distorted as to see no lack of philosophy, no danger, no impropriety in the use of a *secret* remedy, in all cases of disease, when an ignorant empiric or some kind, but too officious, friend declares it to be a specific.

The other class of sudorifics—those whose action is the contrary of stimulants—are less frequently administered by empirics, and are also of a less dangerous tendency at the commencement of a disease. They are, indeed, so seldom used that the author need not extend his remarks in regard to them; but the general argument applied to the former class is, *caeteris paribus*, applicable to these also.

There is yet another method of producing perspiration that cannot be passed over in silence; and that is the application of steam, combined with the internal use of lobelia and cayenne pepper. This practice is considered by its friends and advocates as one of a most wonder working character; and, unquestionably, it possesses a power to kill or cure, one of which ends it accomplishes whenever its use is persevered in. It is most emphatically a kill or cure remedy; and the reason why physicians have discarded it from regular practice, is, that other remedies are equally powerful in removing disease, without being attended with the risk of doing irreparable mischief.

In chronic affections of the chest, one who practices

his profession upon known, and philosophical principles would never use a remedy, violent in its operations. It is an established law, and generally understood, that one extreme in the human system is followed by another—an excitement is followed by a depression—a chill by fever—any unnatural evacuation by a corresponding degree of scantiness—and this change to an opposite state is called reaction. This law we see manifested in pulmonary diseases when the remedy in question is employed. Relief may be temporarily afforded to the suffering organ, by a determination of blood to the skin, and the depletory effect of the perspiration; but when this free evacuation is suspended, a rush of blood to the lungs takes place; the complaint is aggravated; and the difficulty of removing it is increased. And the oftener the remedy is repeated, the more is the trouble augmented. The strength is wasted by the vomiting, and poisonous effect of the lobelia—the general powers of the system are weakened, reduced below par, by the excessive evacuation by sweat—and a new disease is superinduced upon that already existing, by the inflammation excited in the stomach by the cayenne pepper. Thus it requires a vigorous constitution to sustain the operation, and to withstand the consequent effects of the lobelia and steam practice; and the chances are that an invalid, who commences its use, when debilitated by previous disease, will succumb under its influence.

The use of the common vapour bath, uncontaminated by the lobelia and red pepper, is quite another matter; although even it, if indiscriminately employed, produces effects analogous to the practice just mentioned, in pro-

portion as it approximates it in violence, duration, and frequency of repetition. The principle of exciting the skin to increased action—to promote perspiration—is founded on true philosophy; but, like other good principles on which correct practice is founded, in the hands of empirics it has been most grievously abused.

In affections of the heart simulating diseases of the lungs, stimulants, whether they produce perspiration or not, are like the direct application of fuel to a raging fire. In these cases quackery is unable to make the discrimination necessary to guide the choice of remedies; and although the most impudent and ignorant quacks, who roam up and down, to and fro upon the earth, pretend to be able to point out the differences, their assertions are not to be credited. When science and skill, aided by years of experience and constant investigation, both in private practice and in hospitals, are at fault—when they, with all the combined lights of the profession, are liable to err—and when they do make lamentable mistakes—is there not downright folly in placing confidence in a quack—in one who never saw a dissection of the human body—who never saw an organ of the body in health, or in a diseased state—who does not even know on which side the heart is situated, nor to what diseases it is subject? Who would employ a blacksmith to repair a watch, a barber to shoe a horse, a ship-carpenter to make bonnets, or a milliner to build a church? Or who would send a son to a dumb man to learn elocution, or to one born deaf to be taught music? And yet it is quite as reasonable and philosophical to do one of these things, as to expect that the human system should be repaired by one who knows nothing of it.

4. *Tonics and Stimulants.* The general effects of remedies belonging to these classes so closely resemble each other, that they may be ranked together. The effect of stimulants is to excite the activity of the circulation; that of tonics, to render the excitement permanent.

Many of the "balsams," "elixirs," "cough drops," and all remedies that render the cough dry, or *make it more tight*, as it is generally expressed, every thing that is said to be "bracing," possesses, to a greater or less extent, tonic or stimulating properties; and when administered indiscriminately in pulmonic complaints, ninety-nine times in a hundred do mischief. Articles belonging to this class may be, and are, used with great advantage, occasionally, by scientific and judicious physicians; but even then their use cannot be long continued, and they are generally prescribed only for temporary effects.

The merits of stimulants, when speaking of stimulating sudorifics, received perhaps their due share of attention; and under that head we saw the importance, as well as difficulty, of recognizing the difference between affections of the heart and those of the lungs.

The employment of tonics, in diseases of the former organ, will do mischief that will be permanent in spite of all that may afterward be done to counteract its effect; and in these cases too, a stimulant will be followed by a greater aggravation of the complaint than when it produces perspiration, or some other evacuation from the system. Apoplexy, sudden effusion of water into the chest, rupture of the heart, or some equally fatal result, has occurred after the improper use of tonic or stimulating medicines in affections of the heart or lungs.

5. *Narcotics.* There is another class of remedial agents that enter into the composition of many cough nostrums, and specifics for consumption, and all pulmonary complaints — and these are narcotics, or anodynes. They possess the property of allaying pain, diminishing irritability, and producing sleep; to this class belong opium and all its preparations, and many others possessing analogous properties. A violent cough may be readily appeased by an anodyne, so that a person who has been afflicted and tormented for many days and nights in succession, may, by a single dose, be relieved, and obtain many hours of quiet and refreshing sleep. This is all very good, and greatly to be desired. But another effect of narcotics is to suspend secretion from the lungs, by which the cough is relieved, and thereby to increase the congestion that already exists. The cough may be allayed by the continued use of some article of this sort, and the invalid may thus be lulled into a belief that his disease is about to be cured—that he is on the high road to certain recovery. Comforting himself with these fond, yet delusive hopes, he is at length, and perhaps in a very short time, convinced that his strength is gradually failing; that his other symptoms are not mitigated; that he is, in fact, in no better, but rather in a worse condition. Superadded to his troubles there may be constipation of the bowels, diminution of the appetite, headache, and all the peculiar results that are consequent upon the use of narcotic drugs.

Again, we repeat that these articles are a principal ingredient in the composition of all nostrums for the cure of "coughs," "colds," "asthmas," and all other affections

of the lungs, heart, etc. No remedies that are used to remove the ills of our species are more valuable, or beneficial when rightly applied; and on the other hand, few are less useful, or more decidedly injurious when administered by the hands of ignorance and imposture.

CHAPTER V.

CUTANEOUS SYSTEM.

"THE cutaneous system forms a sac which constitutes a general envelope to all the other organs. It may be divided into two large sections, the external and *internal cutaneous systems*. The former is usually called the *skin*, or the *common integument*. The second is the system of the *mucous membranes*. Although they differ much, they are only modifications of one and the same type, as they are uninterruptedly continuous with each other, and in fact are similar in form, in composition, in qualities, and in functions."

"The external form of the system is that of a sac turned on itself and consequently double. From this arrangement openings are formed both in the upper and the lower half of the body, by which the exterior and internal cutaneous systems communicate, and are continuous with each other. These openings generally lead into the chief partitions of the mucous membrane. The latter form a tube which extends from the mouth the whole length of the trunk, and form the alimentary canal." The mucous membrane commences also at the nose and extends into the trachea or windpipe, and lines the whole respiratory apparatus.

The skin is composed of several layers, or tissues, different in their organization.

"The *derma* is the strongest, the firmest part, and the

base of the whole cutaneous system. Always united to the adjacant systems, it adheres to the muscles, in the internal skin by its external face, and in the external skin by its internal face."

"The *papilliary tissue* which is applied to the loose surface of the dermis is in reality only a greater development of it, being composed of numerous tissues, of vessels, and of nerves; it has the form of small, regularly arranged tubercles which vary extremely in the different parts of the cutaneous system in volume and form. The extreme sensibility of the skin depends upon them."

"The *rete mucosum* is a mucous and semi-fluid substance having an immense number of capillary blood vessels." On this tissue depends the color of the individual; varying from the white of the fairest Circassian to the jet black of the African.

"The *epidermis* is whitish, solid, brittle, without vessels or nerves, and entirely insensible." This is the external layer of the skin; and is often called scarf skin.

Besides these tissues there are found in various parts of the skin "simple glands, denominated sebaceous glands."

The hair and nails are considered as modifications of the cutaneous system, or appendages of the epidermis.

Thus we see that the skin is not the simple covering that it is generally believed to be; but that it is an organ of a compound, complicated, and delicate nature. However much we have learned of the structure and functions of the skin during the last few years, it is yet evident that our knowledge in regard to it is far from perfect; and that anatomy has much to do in making us intimate-

ly acquainted with an organ so complex, and so important in the animal economy.

Each organ, and each tissue of the body, is affected by disease in a manner peculiar to itself; and in various organs affected with a similar complaint, a modified treatment will be necessary, from the different aspects which the disease assumes. Comparing the skin with other organs composed of a variety of tissues, and reasoning from analogy, we should be led to the conclusion that its different tissues would be obnoxious to diseases of different characters externally, as well as of absolutely opposite natures; and that they would not all be cured by the same remedial means; nor by the same general plan of treatment. Such we find, experimentally, to be the fact. Few ailments to which the human body is liable are less understood, are more perplexing, or less successfully treated. Doubtless, one reason for this is that the skin has been too much considered as a simple, instead of a complicated, organ—one that is composed of parts or layers, in either of which a disease may be located, and yet appear to be seated in any other. A remedy that would cure promptly an eruption having its origin in one tissue, might produce, if the disease happen to be in another, no good, but an injurious, effect.

Again, the diseases that commence in one layer or tissue of the skin do not continue there; they are not limited to it; but they spread to the other layers, assuming a different aspect in each, and unfortunately for the patient and physician, may require for their cure a different remedy for each tissue.

The difficulty attending this subject, and frequent

want of sueeess, are indeed serious obstacles in the way to improvement; but, instead of disheartening, they should stimulate to greater efforts, to more assiduous and unwearied perseverance on our part, and should awaken a dread of quackery on the part of the patient.

In a work translated from the French by Cazenave and Schedel, there are enumerated not far from one hundred and fifty varieties of disease, affecting the skin in its various layers or tissues. These may, indeed, in some instances, be but different grades or degrees of the same affection; and they may be confined to a small portion, or some particular part of the skin, or extended over a greater part, or the whole, of its extent. No one who possesses a particle of reason can believe that all these diseases are to be cured by one plan of treatment, or by a single article; and no one who is not either a lunatic, a fool, or a knave, will pretend that he has a specific for all cutaneous affections. It so happens, however, that there are quacks who boast of their nostrums, their "certain cures," for all these complaints; and they find, too, a plenty of patients on whom to inflict their ignorance and knavery. It is, in fact, no difficult matter to remove most eruptive diseases, or in the language of quackery to cure them—but many of such cures are the cause of the patients' death—they are really "cured to death."

We have seen that anatomy teaches us that the skin, and lining membrane of the digestive and respiratory organs are similar in structure; and physiology teaches us that they are also analogous in function. We learn also from the observations of our predeeessors, for ages

past, as well as from the facts we daily witness, that a disease commencing in a part of any tissue, is easily propagated throughout its whole extent. And, therefore, an irritation commencing in the mucous membrane of the stomach or bowels, lungs, or any other of the internal organs, may, as it often does, by this facility of transmission, show itself upon the skin. Again, affections that primarily make their appearance upon the skin are, by the same law, transferred to internal organs; and by a rapid and sudden retrocession, in a short time, prove fatal. What mother, or what nurse, has not seen children suddenly die from an affection of the lungs, or of the brain, caused by the sudden disappearance of some seemingly trifling cutaneous eruption?

Many, if not a large majority of the diseases of the skin, owe their origin to some derangement of the digestive organs; and while this cause continues to operate, the disease is absolutely invincible, by any safe medical treatment. They who know nothing, fear nothing—and a quack, who knows not that danger attends his practice, fears not to encounter it. Most of the remedies that are empirically employed in eruptive diseases are such as remove rather than cure, repel rather than eradicate; or, in common parlance, they "strike the complaint in." Such a result is most easily obtained; and from the similarity of structure of the internal mucous membranes to that of the skin, eruptive diseases have almost as great an affinity for the one as the other. When diseases are repelled from the surface of the body, there is no certainty what part they may choose for their location; but one thing is certain—that on the skin they are com-

paratively free from danger, and that after they have attacked an internal organ, life is in jeopardy.

The ill effects of a sudden disappearance of disease from the skin show themselves at different times, from a few minutes, to days or weeks. Such variations depend much on the organ which the disease has attacked; if, for instance it be the lungs, there will be at first, but a slight cough, gradually increasing till it terminates in consumption; or it may speedily produce a bleeding from the lungs, and run its course much sooner. Again, it may attack the stomach or bowels, producing derangement of digestion, diarrhea, and the various forms of disease to which those organs are liable, or it may seize upon the brain, producing various shades of insanity, or doing its work much more speedily by terminating in apoplexy, or inflammation.

Affections of the skin become chronic; and in proportion to the length of time they may have continued, is their removal rendered both more difficult and dangerous. So habituated to their presence does the system become, that it is often inexpedient and hazardous to attempt a cure; lest a harmless, though troublesome, complaint be converted into one of a most alarming aspect. Diseases of this character should be viewed through another medium. While located in the skin, they in fact serve to ward off other and dangerous diseases from internal organs—they serve as a quarantine for the system—a certificate, or endorsement of health; they are often a substitute for that which would destroy life. Physicians of eminence often regard eruptions in children as a warrant for health—they consider them as en-

joying a better chance to arrive at maturity than those whose skin is smooth. Cutaneous eruptions seem to serve as a rallying point for disease; for when a cause, sufficient to destroy the balance of health, is applied, there is often only an aggravation of the complaint. They serve the same purpose, when not excessive, that blisters, issues, setons etc. do when the internal organs are diseased; they localize irritation, and render that harmless which, under other circumstances, would be dreadful.

Any physician of no more than ordinary practice must have seen many cases of obstinate and severe disease consequent upon repelled eruptions; and he who has experienced it knows full well how to appreciate the difficulty of recalling these affections to their original location. And indeed there is no hazard in saying that the danger and obstinacy of a disease, consequent upon a retrocession of a cutaneous affection, is increased many-fold.

An interesting child of eighteen months old, had an eruption on the face, and behind the ears, as is very common among children of that age; its mother had importuned the family physician to cure it, and he, very wisely, advised her to be patient, telling her that the change from the hot to the cold season would probably accomplish what she desired. The mother, however, became impatient—she thought the child's appearance was rendered unpleasant and less interesting, although its health continued perfectly unimpaired. Contrary to the advice that she had repeatedly received from her physician, and being fully warned of the danger, she procured a nos-

trum, with which she succeeded, to her entire satisfaction, in healing the sores. Scarcely a single day had been allowed her for self-congratulation before the child was seized with convulsions which proved fatal in a few hours.

A lady had, for several successive winters, been afflicted with what is called *salt rheum*. It always appeared on the hands, at the commencement of cold weather, and never took its departure till the warm season in the spring. It was always troublesome from its peculiar itching, burning, and smarting sensations that accompanied; and not unfrequently was it so painful that it was necessary to resort to poultices to obtain relief. A succession of remedies had been tried in vain, with the hope of effecting a cure; and all the specifics and "certain cures" of quacks, and kind hearted friends had been equally unavailing. Remonstrances were urged by a physician against this presumptuous course, with little effect; and, at last, a remedy was applied at night, which, by next morning, had wrought a most miraculous cure. The panacea had now been found—that which had been most earnestly desired was at length obtained, and the lady thought she had fairly extinguished her hateful and disagreeable tormentor. Her joy however was but short-lived; in less than twenty-four hours she was attacked with violent pain of the head, pain in the side, with a chill, the precursor of a raging fever. For a few days this patient seemed in imminent danger of dying from inflammation of the brain; then, suddenly, the disease left the head and attacked the lungs. There now occurred an obstinate and troublesome

cough, which was, sometimes for hours, almost incessant; and to this was superadded all the prominent and characteristic symptoms of pulmonary consumption. This state continued for two or three days, when all disease at once vanished from the lungs, and seized upon the bowels; here for a few days it played off its vagaries, and after threatening to terminate the existence of the patient, sought another domicile in the glands of the neck. Here it finally stayed; and after a suppuration of the glands, and discharge of matter from the throat internally, and from the neck externally, during three weeks, the patient began to recover—and in just two months after the application of the remedy to the hands, and after having her life despaired of for weeks in succession, she was in a condition to leave her room. It must not be supposed that no effort was made in this case to recall the salt rheum to the hands; for every thing was done that skill, and medical science could do; but all attempts were unavailing.

A gentleman somewhat advanced in life had been, for many years, troubled with an eruption on one of his lower limbs; he made no complaint of this, only, that it took too much of his time to scratch, and this in fact ought not to have been regarded as much of an evil, since he was in independent circumstances, and could well afford the time. He had been rather urgent to have it cured; but his physician had dissuaded him from making any considerable attempt. His impatience increased, and he applied to a quack with whom he had become somewhat acquainted; and as is usual with gentry of his description, he promised a speedy and safe cure. Oppo-

sition was made by the gentleman's family and friends; his physician warned him of the evil consequences—that in one of his age, apoplexy would be likely to ensue. Remonstrances were lost upon him—the remedy was used—and all went on well for a time. But the train was laid—the match had been applied—and an explosion was soon to follow. Numbness, and a prickling sensation, were first experienced in the foot of one side—then a weakness and loss of control over the foot when walking; and subsequently voluntary motion was lost—the one half of the body became paralytic, and the unfortunate man, on the fifth day of being unwell, died of apoplexy.

But quacks and nostrum venders are not always successful in curing sores or eruptions, although they seldom fail to promise a cure within a given time. A robust man applied to a surgeon for advice in relation to a sore near the ancle. It appeared about the size of a quarter of a dollar, was not painful, and occasioned no inconvenience. The surgeon told him it could be cured, but that he must have a little patience, for it would be a few weeks before it would be entirely well. This advice was not exactly what a person, who has such a companion, would relish; and through the persuasion of friends, he consulted a notorious quack.

"Oh, yes, monsieur," says he, "I can cure de sore—in two, tree weeks you shall be one well man; yes, sare, in two weeks I promise you shall be cured. You pay me ten dollar now, to-day; I give you my medicine; when you take it you pay for it too, and in two weeks you shall be well man."

So the ten dollars were paid, and medicines to the

amount of seven dollars more were taken; and when the two weeks had expired the sore was in a worse state than when he commenced. The man now returned to the surgeon whose advice he first sought, and with shame and contrition for being so easily gulled, candidly confessed the whole affair, and begged to become his patient. In a few weeks the ulcer was healed.

From the preceding observations we may conclude that diseases of the skin are at least but imperfectly understood by those who have studied them most; that they are of a complicated character, and generally only dangerous when transferred to an internal organ.

The remedies employed by quacks in diseases of the skin are, generally, of an astringent nature—operating in such a way as to repel the disease to some internal organ. The hundred specifics for salt rheum have this effect; and so do the multifarious nostrums for "pimples on the face," sores behind the ears in children, and the like. But this is not the worst of their character; for they not unfrequently contain poisonous materials, such as arsenic in some of its forms, lead, etc.; and all cosmetics, and applications for beautifying the skin, and improving the complexion, are worse than useless.

The cutaneous affections for which external applications are employed are, generally, dependent upon internal disease; they are caused by it, and while that exists the external disease can seldom if ever be cured, let the remedy be what it may. Thus, pimples on the face, and salt rheum as it is called, are but indications of deranged digestion; and if injury is not done by the

absorption of the poisonous substances applied, the original complaint is at least aggravated.

Again, affections of the skin, are perhaps more frequently hereditary than most other diseases—and this renders the prospect and chance of a cure more doubtful. It is supposed, from their peculiar obstinacy, that there is some original, congenital, malformation, or defect in the skin—that the different tissues or constituent parts do not bear that relation to each other—do not exist in that proportion—that constitutes a normal, healthy condition. If it be thus, as is conjectured by the best medical men of the present age, then the success of any medicine indiscriminately administered is most uncertain; and to use it thus is unphilosophical and unsafe.

Affections of the skin of entirely different natures, so closely resemble each other, that a practised eye alone can make a discrimination between them; and a remedy that has been successful in one or more of these diseases whenever applied, may in all cases of another do mischief. The best, and most experienced physicians often are mistaken, so completely does one disease simulate another; and from causes hitherto inscrutable are they also frequently foiled in the success of their treatment, with a multiplicity of remedies. Is it possible then for an ignorant man, or a weak member of the sisterhood, to be able to cure all diseases of the skin with a single favorite nostrum?

CHAPTER VII.

OF THE EYE.

I. *Structure of the Eye, and its appendages.*

This includes the eyebrows, eyelids, and globe of the eye.

Eyelids. These consist, 1st of a layer of thin loose transparent skin; 2d, of a portion of muscle; 3d, of fibrous membrane; 4th, of cartilages on the edges of the lids; 5th, of glands beneath the cartilages, having ducts that open near the borders of the eyelids; 6th, of the conjunctiva, a mucous membrane, which lines the eyelids and covers the globe of the eye to the transparent cornea.

Globe of the Eye. This is composed of membranes and humours.

Membranes. These are the sclerotic, cornea, choroid, the iris, hyaloid, and retina, to which may be added the ciliary circle and processes.

1. Sclerotic. This occupies the posterior four fifths of the eye. It is a hard, opaque, fibrous membrane, and is what is called the white of the eye.

2. Cornea. This is a transparent membrane, composed of six plates placed on each other. It occupies the anterior fifth of the eye and is fixed into the opening of the sclerotic somewhat as a crystal is set in a watch.

3. Choroid, situated in the posterior part of the eye

between the sclerotic and retina. Is composed of a vast number of arterial and venous ramifications, united by a delicate cellular tissue.

4. Ciliary ligament.

5. Ciliary processes.

6. Iris. Situated at the anterior part of the globe of the eye in the middle of the aqueous humour. It is of a circular figure, being pierced in the centre by an opening called the pupil, or sight of the eye. On this depends the various colors of the eyes.

7. The retina or internal membrane of the eye; soft, pulpy, transparent and very thin.

Humors of the Eye. These are three; the aqueous, vitreous, and crystalline lens; each enclosed in its membrane.

Lachrymal Apparatus. This consists 1st, of the lachrymal gland which secretes the tears, and is situated behind the upper eyelid and in a depression of the bone which forms the upper part of the orbit. The tears are poured out upon the surface of the eye by canals leading from the gland.

2. The *lachrymal ducts.* These are two; one commencing in each lid near the inner corner of the eye. They convey the tears into the lachrymal sac, which is a small membranous oval pouch; situated at the inner angle of the eye in a groove formed by the bones at the root of the nose.

3. The *nasal duct.* This is a narrow canal, formed by the bones of the nose, and lined by a prolongation of the membrane which forms the lachrymal sac.

II. *Diseases of the Eye.*

Were we to reason from analogy we should be compelled to adopt the conclusion that an organ, composed of such discordant materials as the eye, and so important to the whole system, contrived with such ingenuity and such wisdom, would be affected with a multiplicity of diseases. Such a conclusion observation confirms—it demonstrates the fact.

Each of the membranes, each of the glands, ducts, and each of the component parts may be affected when the others are not; though generally more than one suffers at the same time. Physiology teaches us that each of the tissues of the eye has its own peculiar functions to perform; and anatomy has shown us that they are different in their organization, each one is part of a whole, and all contribute to the same end; and, therefore, when one is incapacitated from performing its office, the use of the eye is more or less impaired. Thus we see the importance of preserving this organ in a state of integrity; and as we use it to watch with, so we should watch over, and guard it against interference from the ignorant and unskilled.

All parts of the eye are subject to inflammation, which produces different effects as it may visit the different tissues, or appendages. In some it runs its course rapidly, doing mischief in twenty-four hours that cannot always be repaired in as many days; and giving occasion to those, who are so unfortunate as to thus suffer, to exercise repentance for their remissness during a long

life. Disease of the more internal parts may occur, which one not thoroughly acquainted with the eye would not be able to recognize; and if this should be allowed to go on, or if it should be aggravated by improper remedies, the eye might be forever destroyed. The slightest disease if allowed to exist and leave its effects in the fine transparent membranes would impair vision, if it did not entirely obstruct it.

An inflammation sufficient to destroy the sight of the eye may exist without a person himself even suspecting any thing wrong; and while these pages were preparing for the press, a case came under the author's observation, where the eye was rendered useless without the patient having been aware that it was diseased. She was not conscious, in fact, that it was not as perfect as the other; and when told to close the other she was astonished to find that the power of seeing with this was lost.

Thus, we perceive, that if a disease so slight as not to be perceived, may ruin the eye, others that are perceived, and which are troublesome, may produce equal injury. And it is in those diseases of the eye which are inconvenient, rather than in those of a more aggravated character, where nostrums are employed, and where the advice of quacks is sought. If the disease be simple, and free from all prospect of danger, an improper remedy may speedily convert it into one of a formidable aspect. We have seen an intense inflammation of the eye, induced in a few hours, by a stimulating lotion injudiciously applied, which it required several days to remove.

Inflammations of the different parts of the eye do not all require the same treatment—neither the same reme-

dies—nor the same general plan; at one stage they may require depletion, and at another a contrary course.

Again there are constitutional, or hereditary affections of the eyes; and to investigate their nature—to appreciate their character—and to prescribe a proper remedy, require all the learning and skill of the profession.

The nostrums most in use by quacks, and those most common in the shops, are either of an astringent, or stimulating character—both of which are decidedly injurious in all cases of recent inflammations, and in many of longer standing. They are sold and known under the names of "eye-water"—"eye-ointments"—"lotions," etc.

CHAPTER VIII.

FEMALE COMPLAINTS.

There are some differences, so striking and manifest between the sexes, that they do not fail to be perceived by the most casual observer; and the more intimately the constitutional peculiarities are known, the greater do they seem. Carrying our investigations still further, we find other peculiarities, and other differences that were not at first observed; and we find that females are prone to nearly all the diseases of the other sex, besides multitudes of others that afflict theirs alone. It need not be wondered at, that such is the case. They have a part in life allotted to them that is full of danger in itself, and fraught with a variety of ills on every side. Besides, nature has so ordained that the functions of this sex cannot be performed without collateral circumstances, themselves being the source of suffering and ill health.

The habits and avocations of women predispose to disease, aside from any sexual consideration; they are less exposed to the healthful influences of the open air, take less exercise, and are generally less able to resist any attack of disease. Nature has wisely made provision in respect to the proportions between the sexes by ordaining that the births of females shall exceed those of males, in all parts of the world.

It is neither expedient nor proper to enter at all

minutely into the character of diseases peculiar to the gentler sex; such of them as honor these pages with a perusal will readily comprehend the whole of what is intended. The different nature of complaints in females is owing rather to organization than to any specific character of the diseases themselves; thus, an inflammation in one organ produces symptoms, and is followed by a train of consequences, of a character opposite to those resulting from an inflammation in any other organ. Although the diseases depending upon sexual difference have traits peculiar to themselves, and sufficiently so to make them a class distinct from others, they are yet so much like all other complaints and affections of the system, that they readily respond to the same general remedies, and feel their influence, whether that be good or bad.

Many, if not a very large proportion, of the diseases of females are, in some stage, of an inflammatory character; and the remedies that remove inflammation in the other sex will do so in females also; and those articles which aggravate inflammatory complaints in males, will also aggravate them in females.

A disease may be of an inflammatory nature, and yet so confined to a single organ, or to a particular part of the body, that it shall not be felt by the system generally. Thus we often see in females a congestion, or determination of blood to an organ, when there will be severe local pain, and pain in the back with great weakness; so great, indeed, is the debility that it is difficult to walk, or keep the body for a long time in the erect position without the mechanical support afforded by plasters.

When this "weakness" has been complained of for years—where it has been considered as pure debility, and treated as such—patients have been astonished to find their strength immediately improved, by the loss of a few ounces of blood by cupping or leeches. In almost every case of weak back, and debility, complained of by ladies, there is more or less of a determination of blood, or inflammation, about the back, or the internal organs adjacent; and this may in a great majority of cases be known by tenderness when pressure with the fingers is made on the spine, or near to it. This test is seldom fallacious; and we believe it is present in nineteen cases in twenty when "weakness" or debility is complained of. It so happens that almost invariably these cases are considered as pure weakness by quacks, and too often by medical men, members of the profession; and the obvious plan of treatment in debility is to restore the strength by tonics, stimulating drinks, and a generous diet. The tonic regimen only increases the difficulty; and not one in ten of those females who are thus affected can bear either tonics or stimulants, in the smallest quantity, without an aggravation of their complaint. After trying one remedy, they have recourse to another; then another; and thus they go the round of nostrums, and derive equal benefit from all—and that is just none at all. When wearied with the internal use of medicines they try external applications. These are far better, for they do not add to existing disease; and, yet, the relief they afford is but temporary, and the hope they inspire is delusive. The most good that strengthening plasters do is by the mechanical support they afford

to the muscles that retain the trunk in its erect position; they may also be of some little use as counter-irritants, but their medicinal properties are of value only as they are food for hope. "Strengthening plasters" are the most innocent of all things pertaining to quackery; for it is hardly possible that they can do any mischief; in most cases they add to the comfort and ease of the patient. Every lady, therefore, who has a weak back may wear a plaster, or as many plasters as she thinks fit, without risk of being made worse; and with very little prospect of being made permanently better.

We well know that the word "debility" is a great bugbear in the estimation of most females; and they believe that if a person is absolutely unable to walk, and is perhaps bed-ridden, it is proof positive that debility is actually present; and any attempt to make them believe the contrary would be considered downright imposition. But appearances are exceedingly deceitful—and never more so than in diseases of females. For the sake of illustration we cannot forbear to introduce the following case; and many parallels to it could be cited if necessary.

A lady had been ill for upwards of ten years, and had passed through the hands, or rather had been subjected to the practice, of many of the faculty, as well as a multitude of quacks, besides having taken all the "certain cures" of all the good ladies that had never failed to cure them and their relations. Still she grew progressively worse, complaining at one time of pain in the bowels, dyspepsia, dysentery, and certain other irregularities that rendered her whole life most wretched. As she never experienced pain in the back unless from direct

pressure, that was never suspected as being the seat of the real mischief; and therefore remedies were addressed to those organs that seemed most to suffer. During the whole time of her illness she had been under the care of one or more who professed themselves skilled in medicine, and it may be supposed that she made a fair trial of tonics, cathartics, and in fact, any thing that was prescribed. Another physician was now consulted. He found her with a pale, and to appearance, almost bloodless skin, and confined to her bed three fourths of the time, solely because she was too weak—too debilitated—to sit up. On examining the back it was found tender to a great degree on pressure; and when it was proposed to have leeches applied, or to have the back cupped, she flatly refused. She protested against such practice, because, as she said, she had been hardly able to exist by the use of "bracing medicine;" and she felt that bleeding would kill her outright. After much persuasion, however, she consented to be cupped. Only a few ounces of blood were taken, which afforded the most prompt and decided relief from all the distressing, harrassing symptoms. This operation was repeated in a few days; and from this time she began decidedly to mend. So confident was she that cupping would cure her, that she begged to have it repeated oftener than was proper; and declared that she felt stronger after every operation. As the disease subsided the blood returned to the skin—her color improved—and in a few months she was able to walk some distance—to ride—and in fact, enjoyed better health than she had done for years.

This, to be sure, is an extreme case; but it is the same,

precisely, except in degree, with very many cases of weakness and debility in females.

Besides the weakness, and some complaints, peculiar to the sex, there are others common to both males and females. We allude to affections of the digestive organs; and, being combined as they are with a disease peculiar to the sex—being sympathetic with it—and dependent upon it—it exists in spite of remedies while the original disease continues. In the case narrated, the patient suffered, year after year, the worst forms of dyspepsia, for which multitudes of remedies were employed in vain. When the stomach and bowels sympathize to any considerable degree—as they invariably do in proportion to the primary complaint—they are apt to be considered as the organ first affected; their disease is thought to be the primary one; and, accordingly, remedies are addressed to them while the real mischief is overlooked.

To conclude these remarks, then, on the complaints of females, we may be allowed to repeat, that the patients themselves are, in a vast majority of cases, ignorant of the true nature of their malady; and the debility frequently misleads a superficial physician, and more especially an unlettered empiric. The practice, founded on this misapprehension which, almost always in chronic cases, consists in the free administration of tonics, and not unfrequently of stimulants, and, being the result of error, must end in mischief.

CHAPTER IX.

OF RHEUMATISM—ITS EMPIRICAL TREATMENT, ETC.

THERE are few diseases, the existing cause of which is to be found in climatorial influence, which are more tedious and painful, and which are, frequently, attended with greater danger than that protean malady called rheumatism. This disease is located by the best pathologists in that tissue denominated *fibrous;* such as the membrane covering the bones, the ligaments about the different joints, the pericardium, or heart-case, one of the membranes enclosing the brain, the sclerotic coat of the eye, the sheaths of the muscles, and perhaps, the muscles themselves. All those different parts are liable, though not equally so, to attacks of this disease ; and as some are more important to the well being of the system than others, so, of course, the danger is greater, in proportion as the organ affected is more essential to vitality. While, for instance, the disease attacks, and continues in, the joints alone the pain may be as acute, and the suffering as great, as when the disease is located in the head or heart, although the danger would be but, comparatively, trifling.

Rheumatism has been divided by writers into acute, or inflammatory, and chronic. The first form of the disease is characterized by those general symptoms that indicate other inflammatory complaints; while, at the

same time, it possesses some traits of character peculiar to itself. The division into acute and chronic is in fact arbitrary and artificial; for they are both but different *degrees* of the same disease; and, yet, they are so distinctive in their features, that a different or modified treatment is necessary in the two forms of the complaint. Any one who has experienced rheumatism in his own person, or seen it in others, has felt or seen the skin covering the joints, in the acute form, red, hot, and the whole joint swollen, exquisitely tender and painful. In the chronic form of the disease, on the other hand, instead of the joint being red and hot, it is *pale* and inordinately cold; and instead of the fever that is met with in the acute form, in this it may be entirely absent

Common sense alone would teach any person that two states of the system, so diametrically opposite in their whole appearance, could not be cured by the same plan of treatment—that a remedy which would cool one part, in one individual, would not be very likely to warm the same part in another person.

In accordance with the nature of the disease, its diversified traits of character, etc., the plan of treatment most successful is that based on general principles, and so modified as to be adapted to the individual features of each case. Sometimes the most violent attack is cut short, and the patient cured, by a repetition of copious bleeding. This practice, proper only in robust individuals, and those of strong constitutions, would, in others, prove highly dangerous, if not fatal. And therefore, another course must be adopted, which, though not so efficacious, is, at least, free from danger. Where bleed-

ing is improper, medicines that excite perspiration may be next best; or cathartics may be indicated, or perhaps neither. The choice of a medicine, or the general course to be pursued in this, as in all diseases, should depend upon the age, sex, temperament, hereditary predisposition, actual state of the patient, and many other circumstances that can be justly appreciated only by a comprehensive, philosophic mind.

There is one peculiarity in rheumatism, which, fortunately, does not belong to many of the diseases that afflict our race; and that is a tendency to change its location—to wander from one part of the body to another. It will sometimes attack one ankle, and, after remaining there for a day or two, seize upon the ankle of the other limb. Then it will return to the knee-joint of the limb first affected, and after a time show itself in the other knee. So it will go, alternately, till each joint in the body has in its turn been visited. But it does not only ramble from one joint to another, it goes from a less to a more important organ—from one of the smaller joints to the eye, the brain, or the heart. When rheumatism is thus transferred, it becomes one of the most formidable and obstinate of all the maladies in the catalogue of human ills. When it attacks the membrane covering the brain, mental derangement is not an unfrequent consequence; and whoever has once experienced it, knows well that the pain is most dreadful. This disease assumes the worst appearance when it affects the membrane lining the cavities of the heart. It then produces violent palpitation, difficult respiration ossification of the heart's

valves, enlargement of the heart, and finally, either general dropsy, or dropsy of the chest, which terminates the "sad eventful history."

When a disease possesses such a fondness for wandering—when its very nature is that of a vagrant, here to-day, and in another place to-morrow, now affecting one part, and in a single hour, perhaps, fixed in some other—the greatest danger is to be apprehended from any improper application. We are taught by the observation of facts, that rheumatism may be driven, as well as go voluntarily, from one organ to another; and that when it is thus driven, it is by no means as easily recalled. Death has been known to result in a short time from the sudden translation of rheumatism from the limbs to the heart, in spite of the most active revulsive remedies that could be employed. It follows, therefore, that, to prescribe judiciously in this disease, an intimate knowledge of its nature, in all its phases, is not only requisite and necessary, but indispensable. Is it safe, then, that it should be treated by quacks? Are the nostrums—the "ointments," "embrocations" the "liniments," and the thousand and one specifics—all "certain cures"—proper or safe to be indiscriminately employed? It is very certain that an application which will cure chronic rheumatism will aggravate the disease when it assumes the acute form. Nostrums are recommended for *rheumatism*, without regard to its character in any particular case; and the chances are, if the remedy is one of power, that injury is quite as likely to follow its use as benefit. An invalid, with chronic rheumatism, is advised to use a stimulating application, with external heat, to his painful joints; he does so, and is greatly relieved. He calls to

see an acquaintance confined to his bed with rheumatism, and hardly able to move a finger; and, without knowing that the disease is of a different character from that which affected him, he urges the sick man to try his remedy. It is tried, with a ten fold aggravation of all the suffering.

Rheumatism, by those who are not informed, is believed to be the same thing in all cases; and if the application of Cayenne pepper, mustard, hot alcohol, or a heated smoothing iron cures one, it will cure another. And so, too, if the inventor of a nostrum can cure a few, he may think that he can cure all; at any rate, if he is disposed to be somewhat of a rogue, and practice upon the credulity, hopes, and fears of invalids, he may know that a great proportion of rheumatics will at least try his remedy. Thus he finds a market for his invention; and if he has not the good luck to acquire a fortune, he must content himself with less success, or set his genius to work in another direction.

Rheumatism may be, and indeed often is, mistaken for other and more serious affections of the joints; and where this is the case, the use of an improper remedy, or the neglect to use efficient means may terminate in the death, or permanent lameness of the patient. As an instance of mischief resulting from ignorance, and consequent neglect, we may adduce the case of a young lad of this city, who, for several months, complained of pain in one of his lower limbs, and other symptoms indicative of rheumatism. His complaint was, of course, considered by his parents as rheumatic, and by them treated as such, till it had increased to such a degree that they very

wisely called for medical advice. But it was now too late. This disease was a scrofulous affection of the hip joint; and it had made such progress, during the period that it had been mistaken for something else, and when perhaps it might have been arrested, that it was beyond the reach of medical science. The boy fell a victim to disease, because his parents *thought* he had rheumatism, and being *only* rheumatism, they *thought* he would get well.

The very fact that rheumatism too often baffles the skill of the wisest and best physicians, is with many a sufficient reason for placing themselves in the hands of quacks, and submitting to the impositions of the most ignorant charlatans.

The reason that leads people to act thus would be called little else than madness if applied to other subjects. If for instance a skillful jeweller cannot repair a pearl, or diamond ornament, would a stone mason, or carpenter be any more likely to do it, because they can build a splendid house?

CHAPTER X.

OF DEAFNESS—THE ORGAN OF HEARING—ITS STRUCTURE —CAUSES WHICH DERANGE ITS FUNCTIONS—NUMBER AND VARIETY OF ITS DISEASES—THEIR TREATMENT—QUACK REMEDIES, ETC.

Few organs in the human machine are more useful than the ear; and the loss of any of the senses is not more to be dreaded than the loss of the sense of hearing. Meckel calls this "the most noble and intellectual of all the senses." The ear may be less complicated in its structure than the eye; yet, on examination, we shall find it an extremely delicate organ, and its functions deranged by slight causes.

Deafness is but a symptom, or rather the result of a variety of diseases, or of disease, affecting the different tissues that contribute to the formation of the organ of hearing. Deafness is too often considered as a disease by itself—a simple thing; and, accordingly, prescribed for without a knowledge of the structure of the ear, or the laws which govern its functions. On the other hand, a loss of hearing has been considered as an incurable malady; and one who has been so unfortunate as to be thus afflicted, has been pronounced as past help, past hope, when, perhaps, a simple remedy would have restored to him that which is above price.

The organ of hearing is divided by anatomists into

three parts; the external ear, the middle ear, and the internal ear.

1. "The external ear, embraces the cartilage, and the auditory passage.

2. The middle ear is formed by the cavity of the tympanum and its appendages.

3. The internal ear is formed by a series of cavities known as the *labyrinth*."

A very brief description of the middle and internal ear is all that is necessary in this place.

Membrane of the Tympanum.

This is a thin, elliptical membrane, which separates the external auditory passage from the middle ear. It is stretched across the long canal so as to be a partition. Its analogy both in situation and function to the head of a drum is very close.

Tympanum.

The *tympanum* or *drum* is a narrow, rounded cavity. It forms the central part of the ear, and presents numerous depressions and elevations, which are connected with the labyrinth. It encloses the little bones of the ear, the cord of the tympanum, and is lined throughout by a mucous membrane which is continuous with that of the throat. All the numerous depressions, elevations, openings, etc. of the tympanum have each their anatomical name and description; but which would be little edifying to the non-professional reader, and may therefore be omitted.

Eustachian Tube.

The Eustachian tube is a canal of about two inches long running from the top of the throat, or posterior part of the mouth, to the cavity of the tympanum.

Bones and Muscles of the Ear.

The bones of the ear are the smallest bones in the body. There are three; the *hammer* (malleus,) the *anvil* (incus,) and the *stirrup* (stapes;) and in the early periods of life a fourth, the *orbicular* bone. These form a chain, and extend from the membrane of the tympanum to the labyrinth. These bones are articulated or form joints with each other, and have four muscles attached to them by which they are moved whenever an impression is made upon the membrane of the tympanum. These muscles, like the bones, are the smallest in the body.

The Labyrinth.

The labyrinth is divided into the *vestibule*, *semi-circular canals*, of which there are three of about half a line in breadth; the *cochlea*, which takes its name from the shell-fish which it perfectly resembles; the *aqueducts* —the aqueduct of the vestibule, and the aqueduct of the cochlea. A part of the labyrinth is called the *membranous labyrinth*, and contains in its cavity a fluid, called the *lymph of Cotugno*.

Auditory Nerve.

This nerve upon which depends the faculty of hearing, enters the auditory passage and is distributed to the

membranous labyrinth. Its branches are sent to the vestibule, semi-circular canals, and cochlea; and they terminate in the pulp, or fluid, which fills those cavities.

In addition to the organ of hearing, as above described, there are the mastoid cells—irregular cavities in the large bony prominence behind the ear—which in some manner contribute to the perfection of the sense of hearing.

Physiology of the Sense of Hearing.

The sonorous vibrations of the atmosphere are conducted by the external auditory passage to the membrane of the tympanum; this conveys the impression to the chain of small bones, which, being put in operation by means of their muscles, transmit the impression to the cavities in the labyrinth, in the fluid of which the auditory nerve terminates, and by this nerve the impression is carried to the brain. The drum of the ear, like any other drum, to be able to emit any sound must have a communication from its interior with the external air, that its membranes may be allowed to vibrate. This communication is permitted by means of the eustachian tube; and whenever this is obstructed, as it frequently is, by inflammation and swelling of the throat, or by thickening of the membrane lining its internal surface, the sense of hearing is impaired or wholly destroyed.

Diseases of the Ear.

To any one who should take but a single glance at the organ of such complexity as the ear, it would seem that its diseases should be many, and also of a complica-

ted character. Such indeed is the fact. Without taking into consideration injuries done to the ear by external violence, and congenital imperfections, the following may be reckoned the most important diseases to which the organ of hearing is liable. They are taken from Cooper's Surgical Dictionary.

I. 1. Auditory passage obstructed by thickened or hardened cerumen (wax.)

2. Imperfect secretion of wax.

3. Discharges from the auditory passage.

4. Excrescences in the auditory passage.

5. Herpetic, ulcerous eruptions in the auditory passage.

II. Affections of the Tympanum.

1. Perforation of the tympanum by sloughing consequent upon scarlet fever, acute inflammation, etc.

2. Fungus of the tympanum.

3. Caries, or ulceration of the bones of the tympanum.

4. Relaxation of the membrane of the tympanum.

5. Tension of the membrane of the tympanum.

6. Chronic thickening of the membrane of the tympanum.

7. The cavity of the tympanum intersected by numerous membranes that impede the motions of the small bones.

III. Obstructions of the Eustachian Tube.

1. Obstruction from thickened mucous in a severe cold.

2. Obstruction from thickening of the lining membrane in inflammation.

3. Obstruction, and permanent deafness, by the healing of sores in the throat when the tube is obliterated.

4. Obstruction from swelling of the tonsils, in quinsy, scarlet fever, etc.

IV. Obliteration or obstruction of the mastoid cells from thickened mucous, inflammation, etc.

V. Diseases of the Labyrinth.

1. Disease of the fenestra ovalis, and fenestra rotunda, as ulceration, thickening, etc.

2. Inflammation of the mucous membrane which lines the cavities of the labyrinth.

3. Alteration of the liquor of Cotugni, or Cotunnius.

4. Deficiency of the same fluid.

VI. Affections of the auditory nerve.

1. Diminution of size.

2. Change of structure, as hardening, etc.

3. Paralysis.

VII. Disease of the brain, or its membranes, in the part from which the auditory nerve originates.

It is not within the power of credulity to believe that such a variety of diseases are to be treated, successfully, by the same general plan; much less that they are to be all cured by the same remedy. When diseases of the ear are of a decidedly inflammatory character, they are most readily cured by the antiphlogistic, or "*reducing*" method, carried to such an extent as all the circumstances of the case seem to render necessary. These modifying, or controling circumstances are,

1. The violence of the disease.

2. The particular part affected.

3. Duration of disease.

4. Cause of disease.
5. Age of the patient.
6. Constitution and strength of the patient.
7. Hereditary predisposition.
8. Occupation.
9. Sex.

These, and other equally important considerations, must render the practice materially different in any two similar affections of the ear, or its appendages; and however alike they may be, the skilful, observant, practitioner will yet see such difference in their characters as to modify his prescriptions to suit each individual case. The same disease in the organ of hearing, like a disease of any other part, does not require the same treatment throughout its course; but when the disease abates, or in any other particular changes its character, the remedies must be changed also.

The depleting, or reducing plan consists in bleeding from the arm, leeching, cathartics, etc. Now, it so happens that a copious bleeding from the arm is occasionally necessary in the commencement of the treatment of inflammation of the ear, or any other organ; and it is necessary to repeat this, and not unfrequently is it also necessary to apply leeches once and again, in the same case, till the force of the disease is subdued. But when this is done, it would be unwise to pursue the same vigorous measures; for instead of curing, they would probably kill the patient. The practitioner, therefore, if he understands what he is about, will resort to other means less active, but sufficiently so, to continue the impression already made.

To rightly understand the diseases of the ear, it is necessary to be intimately acquainted with its structure—with all its complexity; and he who attempts to repair this organ without a knowledge of its anatomy will be altogether more likely to do irreparable mischief than to do good.

There has been one remedy, much used of late, from which have resulted the most happy effects. It is the injection of air, or fluid, into the internal, or middle ear, or tympanum, through the eustachian tube. Deafness of many years standing, has thus been cured; but like all remedial means, it can only be applied in certain cases with any reasonable hope of success.

Various remedies have been used in affections of the organ of hearing by being applied to the membrane of the tympanum through the auditory passage; these, too, are adapted to particular cases only, and much care is requisite in their choice, lest the delicate organization be injured.

Notwithstanding the complexity of this organ, and the multiplicity of diseases to which it is subject, and the diversity of their character, as well as the variety of treatment necessary for their cure, we yet see those who are totally ignorant of the whole subject, boasting of their "certain cures," for "deafness." To cure deafness, it is necessary to know what *part* of the organ of hearing is in fault; and yet the quack knows not that it consists of more than one part.

It is a part of the system of quackery to be able to give a rationale—the philosophy—of all disease that it professes to cure. A quack, or any one who rides his

hobby, will make one, as ignorant of the subject as himself, believe that he knows all that he pretends. He will talk learnedly about the physiology of this and that organ, and the operation of medicines; he will discourse wisely on the nature and cure of disease, and his auditors will listen with great attention, and drink in with greedy ears every syllable uttered by this oracle, and be about as much edified as an assembly of ladies with a Hebrew oration at a college commencement.

All the "cures" for deafness may occasionally do good; but when the remedy is a secret, it is always uncertain what the effect will be. It is like striking at random at an unseen enemy; if the blow is successful, it is the result of good luck rather than of a sure aim.

CHAPTER XI.

OF CANCER—CANCER DOCTORS, ETC.

This disease takes the Latin name of the crab, from its fancied, or real, resemblance to that animal. It affects many parts of the body, as the breast, lips, skin—particularly of the face—stomach, or rather its pyloric orifice, etc.

The first that is discovered of this disease is, generally, a hard tubercle or tumour, of a greater or less size, sometimes having the feel under the skin of a shot, or not unlike that of a marble. The resemblance to a crab consists in what may be termed prolongations from the central tubercle; they are bands of diseased cellular membrane, and, diverging as they do, a fertile imagination has likened them to the legs of the sea crab.

It is not every lump felt in the breast, or any other part of the body that is a cancer; and, again, tumors that are at first harmless assume a malignant appearance and become cancerous. To distinguish at all times, and with accuracy, between what is originally simple, and what malignant, and to decide with certainty that the simple is not to become malignant, is a degree of perfection to which medical science has not yet attained. This much, however, may be considered as settled—that when a tumour does not disappear under the most appropriate treatment, and particularly, if it shows any disposition to

increase or to become painful, or otherwise troublesome, it should be at once freely removed with the knife. This is safe, but little painful, and if the disease is local, the constitution being unaffected, is pretty sure of success.

A cancerous tumour is most generally discovered by accident, so that it is probable that it may have existed for a long time, without in any degree disturbing the health. But immediately after discovery, it may commence a rapid march in its progress to maturity. This is, doubtless, accelerated by mental anxiety in regard to the suspicious character of the tumour; and the frequent handling, with, perhaps, stimulating or irritating applications, contributes in no small degree to the same result. When speaking of the treatment of this disease we shall see that whatever irritates, aggravates it; and the more frequently such remedies are applied, in the same proportion do the chances of a cure diminish.

The exciting causes of cancer are various; among which are blows, pressure, etc. An injury, which results in cancer, is not unfrequently done in assisting females to alight from a carriage, or other height, by placing the open hands under each arm. This must, necessarily, bring both thumbs in contact with the breasts; and as those who are assisted in this way are generally either delicate, or in feeble health, they are, consequently, so much the more likely to be injured. Many, who have suffered from cancer, can trace the first uneasy feelings they have experienced to a slight hurt on being assisted to alight from a carriage in this manner; and little was thought of it, because no danger was apprehended from

so slight a cause, till the disease proclaimed itself in so audible a voice that it would be heard.

Pressure from a tight dress is another frequent exciting cause of cancer; and so it is of pulmonary consumption, dyspepsia, and a host of other maladies that render the life wretched—and, yet, it is foolishly, madly, persisted in. The constant, and long continued pressure of a hickory, or steel busk, will, invariably, in one predisposed to cancer, excite an irritation that will develope the disease.

Cancer is said, and believed by the best writers to be, hereditary—which means that a child inherits, not cancer itself, but a constitution, a temperament which predisposes to the disease, and in which the disease may be produced by slight causes. Those who have had a parent afflicted with cancer are often apprehensive that they will be afflicted also; and if they do believe that they inherit the taint, cancer rises up to their imagination, like a spectre which is said to haunt a murderer, to embitter all their days. The mind works on the anticipated evil; search is made, much too frequently, for a tumour, and if not found, its appearance is waited for with the greatest uneasiness. The anxiety of mind adds to the predisposition already existing, and renders the occurrence of cancer the more certain.

Even where the hereditary constitution exists, it does not render it positively certain that the disease is to be developed; for by adopting a proper course for the regulation of the whole life, the inherent tendency may be greatly counteracted or entirely obliterated.

Cancer has, very justly, been considered as one of the

opprobria medicorum—one, that under all or any circumstances, has small chance enough of being permanently cured. And because it calls for, and too frequently baffles, the skill of the profession, like other diseases it has afforded a most excellent opportunity to the empiric, to enrich himself, without affording to his patient any reasonable hope of benefit. The more certainly fatal, and consequently, the more alarming the disease with which a person is afflicted, the more is he disposed to trust himself to the uncertainties of charlatanry. Cancer may be, as it frequently is, cured by extirpation with the knife—the only certain and only safe remedy. External applications have also been used, and, sometimes, with temporary, or it may be, permanent good effect; and these are the remedies most constantly employed by the empiric. The cancer-doctor professes to be in the possession of a secret specific for this disease; he works upon the fears of those who have, or believe they have cancer, and who, being desperate, like a drowning person grasping at straws, seize upon the frail hope that is offered by the hand of ignorant charlatanry. The empiric decries the surgeon's knife and professional skill; he boasts of his cures, and unparalleled success, and in confirmation of his arrogant pretensions presents certificates of cures signed by names of unquestionable veracity.

The applications most commonly employed by quacks for the extirpation of a cancerous tumour, are plasters into which enter, as a principal ingredient, some one of the mineral escharotics. A preparation of arsenic is more frequently used than any other. The patient is made to believe that the pain arising from the applica-

tion of a caustic substance, and the consequent suffering, is much less than that caused by the knife, which is just as true as to affirm that the prick of a cambric needle is more dangerous than a stab from a bowie knife, or a thrust from a bayonet.

The "cancers," that are cured by cancer-doctors, are *not* cancers, though they may resemble them, and may have been pronounced such by eminent professional men. Their close resemblance to cancer, and their cure, answer all the purposes of the empiric—to gull the people and obtain their money. A man of gross habit, who is more likely to be affected with tumours in the skin, or other parts usually the seat of cancer, has a lump in the cheek which creates no little anxiety; he consults a physician who assures him that the disease has no appearance of cancer, and prescribes a course that will, in all probability, remove the unwelcome visitor. But not satisfied with this, he hears of some famous cancer-doctor who has wrought most marvellous cures, more especially in those whom *the doctors had given up*, and forthwith, he seeks out the quack to test his skill upon himself. A pretty liberal price, in advance, is always sure to elicit such an opinion and prescription as will harmonize with the preconceived notions of the patient; if he believes it is a cancer, then the cancer-doctor pronounces it so at once; if he thinks otherwise the cancer doctor thinks so too, unless it is for his interest to think differently. If the tumour is decided by the quack to be a cancer, an application of some caustic substance—something that destroys the part to which it is applied—is made; and if the thing be really a cancer

there is a possibility that it may be cured, while there is a great probability—many chances to one—that it will not only *not* be cured, but that it will be so aggravated that it can never be successfully removed by a surgical operation. When a cancer is cured by plasters, or when any tumour is thus removed, it is done by the intense inflammation excited either in the tumour itself, or the adjacent parts, or it may be both; this terminates in a sloughing, or casting off of the diseased part, leaving only an ordinary ulcer which soon heals.

Cancer, if it be at first a purely local disease, the constitution uncontaminated, shows an invincible tendency to extend itself to the neighboring glands, and to develope itself in them. If, for instance, it appears in the breast, it soon affects the glands in the arm-pits; they become involved in the disease, and if they do assume the cancerous nature, the patient generally becomes a victim. Hence it is, that in all treatment for cancer, irritating applications and stimulating medicines should be studiously avoided; and, therefore, every caustic that does not *cure*, invariably does mischief, by adding fuel to the flame. When a tumour, whether it be cancerous or not, is cured by the application of a caustic plaster, it is generally removed whole; and if there are prolongations, or offsetts, from the central body, these not unfrequently come away at the same time. The cancer-doctor then boasts of the triumph of his skill; and the patient, not knowing that his life has been placed in jeopardy by the rash means of cure, readily believes all that is told to him. The disease is named cancer, the cure is proclaimed far and wide, and the cancer-doctor reaps a fresh harvest of glory and—cash.

But while one is cured of cancer by quackery, forty are killed; and when death is the result, the cancer-doctor, though he be as ignorant as a baboon, attributes it to any thing else rather than to his want of skill, or ignorant interference. The fame of cancer-doctors is acquired by curing bad ulcers, and by removing suspicious tumours that might perhaps have become cancerous, and by also removing simple tumours that would never have become malignant. These are all named cancer, and hence the reputation consequent upon curing them, which would be no more than is justly due, were the claims founded in truth and justice. An empirical mode of treatment of cancer is, in any case, without exception, when the disease is not recent, and the tumour small, and confined to a single spot, positively hurtful; and every irritating application, and every day of delay, is increasing the danger and diminishing the chances of a recovery.

There seems to be a tendency, in the minds of most people, to magnify the dangers of disease. If a child is sick, its parents think it *very* sick; and if the doctor looks upon it as a little dangerous, they think the danger imminent. And so it is with adults themselves; they like to be thought dangerously ill, when perhaps they are only moderately indisposed; and they perhaps take offence if their disease is not regarded by their friends as it is by themselves. It is not an unfrequent occurrence that a physician, when he perfectly understands a case, and is treating it wisely and successfully, is dismissed in disgrace, if he does not concur with the patient and his friends as to the degree of danger. To account for this

obliquity of the mind is not our purpose; but it is used as a most powerful lever, by more than *cancer*-doctors for the furtherance of selfish, and disreputable objects. It is this strange feature in the mental character that accounts in great measure for the easy credulity of those who happen to have any tumour that resembles cancer; they help to cheat themselves even to their own most serious detriment.

We here subjoin an extract from an epitaph on a cancer-doctor, written by Dr. Hopkins, of Waterbury, Conn. many years ago.

> "Go readers gentle, eke and simple,
> If you have wart, or corn, or pimple,
> To quack infallible apply,
> Here's room enough for you to lie.
> His skill triumphant still prevails,
> For death's a cure that never fails."

CHAPTER XII.

OF MEASLES—BAD MANAGEMENT OF MOTHERS AND NURSES.

The measles is a disease, which, though not often treated by quacks, or quack remedies, is yet frequently treated in such a manner that the patient is sacrificed to some popular remedy. It is our intention only to glance at this disease, for the sake of noticing one or two great errors that we have, too often, seen lead to fatal results.

This is a complaint of childhood. It is contagious, and one of those diseases which visits us generally but once in our lives. But it occasionally happens that a person may be exposed to measles, hundreds of times, in all the stages of childhood and youth, and yet escape, till, perhaps, in advanced life a fresh exposure is followed by the disease in a most aggravated form. Infants at the breast do not usually contract this disease; though to this there are frequent exceptions.

The measles is observed to run a pretty uniform course, in all cases, after exposure to the contagion. There will be the same catarrhal symptoms—the sneezing, coughing, watery eyes, pain in the head, etc. succeeded by chilliness, pains in the back, and bones, fever and eruption. These symptoms do, indeed, differ in degree—that is, the disease is more violent in some than in others, though in all it has the same characteristics—its own peculiar features. When it shows itself with great.

violence it may be mitigated by medical treatment; but it must run its determinate course—it must pass through its several stages; and he who would attempt to avert it in its course—to cure it before the period of efflorescence, might as well, and as wisely,

> "Seek to fetter flame with flaxen band,
> Or stem the raging stream with sand."

All that can be done is to change its character from a dangerous to a safe disease, and watch it carefully during its progress to a happy termination.

From one to two weeks, generally, after exposure to contagion, the catarrhal symptoms commence; and about four days later the eruption makes its appearance. About the fifth or sixth day it begins to fade, and gradually disappears, so that by the tenth or eleventh day the skin has resumed its healthy aspect. Though the disease is in fact the same at all times and seasons, it is much *worse* at one time than another. It usually prevails more extensively in the winter and spring than at any other season; and at this time, too, it is most violent. But it assumes the worst appearance, and proves the most fatal, when it appears as an epidemic—spreading over a great extent of country; then it is that it makes sad havoc among the youthful population.

The point that we desire to impress most forcibly upon the minds of our readers is this—that *the eruption is always proportioned to the degree of fever;* and therefore, whatever aggravates the latter, increases the former. With the fever commences the danger in measles; and as the eruption is the measure of fever, so we may con-

sider it to indicate the degree of danger. But, unfortunately, this is not so with the mass of "the people." With them it is directly the reverse. They think the greater the quantity of eruption, the better the child has the disease. Misled by this most erroneous and fatal notion, and desirous of *bringing all the measles out*, they accordingly force the child to swallow large quantities of hot herb tea, gin toddy, cider, and other drinks of a kindred nature; and not satisfied with thus setting on fire the habitation—and expelling the enemy, they confine the patient in an overheated apartment, smouldering under a heap of bed clothes. And now the mother or nurse will express her wonder to the doctor why her child should be so sick, with so much fever, or delirious, when the measles have "*come out so well;*" and, to show how well they have come out, she carefully removes the bed covering, exposing the patient as red as a boiled lobster. If it so happen that a physician is not opportunely called in at this time, the same stimulating treatment is continued, with a design to *bring out* all the measles; and the disease thus aggravated—forced into violence—attacks some vital organ, and speedily terminates existence. Every practitioner of medicine has seen many such cases within his sphere of observation; we believe we shall be borne out by the concurrent testimony of the profession, when we say, that a large proportion of deaths from measles result from neglect of appropriate treatment during the stage of febrile excitement.

A principal reason why physicians are not sooner, and more generally called in this disease, is the popular

opinion that they can do no good in measles, because the disease will run a definite course in spite of medicine. This error is as general and as fatal as the administration of alcoholic, and other stimulating drinks. It by no means necessarily follows, that if the measles cannot be stopped short, and perfectly cured, like pleurisy, at their commencement, they cannot be mitigated and rendered free from danger.

The organs most likely to become immediately involved in disease, in measles, are the lungs, or rather the mucous membrane lining them, and the whole respiratory apparatus. They are affected during, and subsequently to, the measles, with a peculiar inflammation—different in its nature from inflammation consequent upon exposure to cold, or that resulting from any other cause, less under the control of the physician, by any treatment that he may adopt, and, of course, more likely to prove fatal.

Great caution is required, after the eruption has disappeared, that a relapse is not induced; for this is always more dangerous than the original disease, and is very apt to follow a slight exposure to cold or a transgression in diet that, at other times, might be committed with impunity.

The conclusion, then, in regard to measles, is, that it is a disease not to be trifled with; that if medical advice is sought at all, with the hope of being benefited thereby, it should be in the early stage of the disease; and that all the medical treatment employed by mothers, should be confined to a dose or two of castor oil, bathing the feet in warm water, and giving the patient to drink either

toast water, or warm flax seed tea. We do not say that there are not cases where other, and more efficacious means are not requisite to bring the eruption to the surface; we know that cases do occur that require the most energetic remedies to save the patient from the dangers of a local inflammation. But these remedies are not to be prescribed by an ignorant head, or administered by an unskilful hand. This, like all diseases where the issue may be doubtful, and which we know do sometimes terminate fatally, had better be left to the management of the family physician. If the patient requires but little or no attention, then this attention costs but little; and if one or two professional visits prevent a protracted or dangerous illness, a great point is gained.

CHAPTER XIII.

OF NATURAL BONE-SETTERS—NATURAL FOOLS, STRUCTURE OF THE JOINTS, ETC. ETC.

The world has always been blessed with a goodly number of those who claim to have acquired extraordinary, if not supernatural power. Some have claimed to be prophets, having been divinely inspired; and professing to have held communication with the Almighty and received revelations from him, claim to possess a knowledge of all things past, present, and to come. Some are said to be born with these powers. The seventh son was, and is yet, believed by many to possess the power of curing some diseases by touch, and to be in fact a natural doctor—being born into the world with a taste for physic, and a fondness, and faculty, for prescribing it. We have seen, in the former part of this volume, that the practice of medicine in the early ages consisted in the performance of incantation, and in working "mighty magic;" and we have seen, too, that such practice was agreeable to the ignorant and superstitious people of those primitive times.

But all such fooleries and mummery no more than equal the arrogance, and pretentions of some few characters of our own day and generation. There are some few cases on record, of children being born with a goodly quantity of hair and nails; others are known to have

made their entrè with a few teeth ; and a fewer number still have exhibited a goodly set of double teeth in both jaws. A little girl might have been born with a tolerably fair knowledge of music, dancing, and sundry other accomplishments ; or she might have made her first appearance with her tender head well stocked with a knowledge of domestic duties. But such an instance has never come to the writer's knowledge ; nor has he ever heard of a boy who commenced his pilgrimage here with a knowledge of the dead languages, or even with a smattering of his vernacular tongue. It is said, in mythological fable, that Minerva leaped from the head of Jupiter full grown, and completely armed ; but there has not been a single instance known, in our day, of a child having been born even booted and spurred.

Some few, however, assert that they are born with a knowledge of anatomy and surgery ; that if not adult in in stature, they are, at least, adults in medical science ; if not full grown men, they are full grown doctors—in short natural bone-setters. People have different tastes, and different faculties for acquiring knowledge ; but we may, just as reasonably, expect one child to be born with an intimate knowledge of navigation, or clock-making, as for another to possess an acquaintance with medical science. But natural bone-setters find natural believers in their extraordinary skill ; and like all other quackery, the more magic the more money.

A certain gentleman, pretty extensively known as a teacher of writing, advertised to teach his art, and to make his pupils first rate penmen in a very short space of time. He succeeded in obtaining the number of

scholars he desired. One of his competitors resolved to make an experiment upon the gullibility of the public, and accordingly, put forth an advertisement, in which he magnified his own abilities as a teacher of penmanship, and professed to accomplish his pupils in the art of writing in the incredibly short space of *five minutes.* The bait took, and, big as it was, some easily, and gladly, swallowed it. The advertiser meant it for a joke —a burlesque upon one whom he considered a quack; but notwithstanding its palpable absurdity, pupils offered themselves for instruction.

It is the boast of these self-styled natural bone-setters that they never saw a human skeleton, or even a single human bone; and they probably never so much as dreamed of dissecting the human body. To study the bones of a dry skeleton, alone, does not afford sufficient knowledge of the joints to make one skilful in reducing them when dislocated. In the living body the ends of all the bones which form joints are covered with a cartilage; and this is never seen in the dry skeleton. There are ligaments also whose use is to retain the bones in contact, and preserve the integrity of the joints. They are very firm and strong; and there is always more or less rupture of these ligaments in dislocation. They interfere, too, with the operations of the surgeon in his efforts to replace a dislocated bone; so, that, without a knowledge of their existence, and their particular relations with the joint, much more pain and suffering to the patient is caused, if in fact, the bone can be reduced at all. The tendons of muscles, too, pass over some of the joints in such a manner as to make the reduction or

setting, of a dislocated bone extremely difficult; for they are put upon the stretch, and firmly retain the bones where accident may have placed them. The position of a limb most favorable to the reduction of a dislocation, or fracture, is a point too frequently overlooked by the best surgeons—and unknown to the empiric, or natural bone-setter. For instance, a joint may be dislocated, which always puts some of the muscles upon the stretch. Now the ends of the bones are so situated that they must be separated before they will slip into their proper places; and this is to be accomplished in only one of two ways, to wit—either by directly extending the limb by force, or by placing it in such a position as to relax those muscles already upon the stretch. The muscles can be stretched only to a certain extent; and, if their tension is already carried to the utmost, it is quite clear that they can be stretched no more. It is often the case that after the force of three or four men has been repeatedly applied in vain, to a dislocated limb, under the direction of an ignoramus, and sometimes, too, under the supervision of those who ought to know better, a skilful surgeon has, by placing the limb in a proper position, and without any assistance, slipped the bone into its place in an instant. The most remarkable instance of oversight in this particular, that we can recollect to have heard occur to an eminent surgeon, was related to us by Dr. Stevens of this city, who is as distinguished for his unpretending manners, and his total want of arrogance, as for his good judgment and practical talent in the profession to which he is devoted, and to which he does great honor. When in Europe, a few years since, the doctor visited

one of the principal hospitals in company with the attending surgeon of the establishment. A patient had just been brought in with a compound fracture of the leg, the broken extremity of bone projecting an inch or two through the skin. The foreign surgeon made an attempt to replace the bones; he directed several assistants to extend the limb with all their power, but it was not sufficient—the bones were immovable. After repeated, ineffectual, trials of this kind, the doctor gave it up as an impossibility, and said he would remove the ends of the bones with a bone forceps. While crossing the hospital yard with Dr. Stevens to procure the instrument, Dr. S. said to the surgeon in his quaint way, that he had often found flexing the limb to have a good effect. "Stop," says the other, "that's a good thought, let us go back and try it." So they returned; the surgeon put the limb in a proper position, and in less than a minute the bones were in their place. So much for one of the largest European hospitals, and one of the most eminent European surgeons.

The following account of the structure and diseases of the joints was prepared, at the author's request, by his brother Dr. B. Ticknor, Surgeon in the United States Navy, and Fleet Surgeon of the South Sea Surveying and Exploring Expedition.*

Structure of the Shoulder Joint.

The shoulder-joint is formed by the junction of two bones, namely: the shoulder-blade, and the arm-bone. The former is a broad flat bone, and so connected with

* He has since resigned the office of Fleet Surgeon.

the trunk, through the medium of muscles, as to be quite movable, and thus allow a greater extent of motion to the arm, than it could otherwise have. In this particular, the connection of the upper extremity with the body differs from that of the lower extremity; for the latter is connected with the body through the medium of a bone, which itself has no motion, and allows less freedom of motion to the lower extremity than the arm enjoys.

The articulating cavity of the shoulder-blade is so shallow as to receive only a very small segment of the head of the arm-bone; and were it not for the ligaments and muscles which surround this joint, it would be extremely insecure, and dislocations would be liable every moment to happen. That part of the shoulder-blade in which the articulating cavity is situated, is connected with the body of the bone by a neck, which, though short and thick, is nevertheless liable to fracture. It is important to mention this, since a person not well acquainted with the anatomy of these parts, might easily mistake the fracture just mentioned, for dislocation of the shoulder, and treat it as such; the consequences of which would be more serious.

The head of the arm-bone being nearly round, and being received into a very shallow cavity; the arm enjoys a much greater extent and freedom of motion than it otherwise could.

The security of this joint depends, almost entirely, as we have said, upon the ligaments and muscles which surround it. The most important ligament concerned in the structure of this joint, as indeed of all other movable joints, is the capsular. It is of a very firm texture, is

firmly attached to the neck of the shoulder-blade, and to the arm-bone just below its head, and thus surrounds the joint like a sack. It is loose, in order to admit of the freedom of motion which it is necessary the arm should enjoy.

The greatest security of this joint, however, depends upon the strong muscles which surround it. There are four of these whose office it is, to draw up the arm and keep the head of the bone from being thrown out of its shallow socket. There are also four muscles connected with the arm-bone in such a manner as to draw it downward. It is important to understand the situations and offices of these several muscles, in order to understand fully what takes place in a dislocation of the joint, and the scientific and proper manner of reducing a dislocation. Without a correct knowledge of the anatomy of these parts, it is impossible that any one can know precisely what obstacles he has to overcome, before he can replace the dislocated bone. This will be rendered evident from the few words we shall say upon

Dislocations of the Shoulder-Joint.

No joint of the body is so liable to dislocation as the shoulder, as any one acquainted with the structure of the joint might suppose. The arm-bone is liable to be displaced in three different ways; 1. downward into the arm-pit; 2. downward and forward, with the head of the bone under the large muscle of the breast; and 3. downward and backward. Of these three kinds of dislocation, the first is much the more frequent; and next to this the second is the most common. A dislocation upward

cannot take place, without a fracture of a bony process of the shoulder-blade, which covers the upper part of the joint in the form of an arch.

It has been mentioned that a fracture of the neck of the shoulder-blade sometimes takes place, which it is of the utmost importance to distinguish from dislocation. This cannot be done, however, without a knowledge of the anatomy of the parts.

The character and design of this work, does not require that the signs by which the several kinds of dislocation of the shoulder-joint, and of the fracture just mentioned may be known, should be enumerated; or the mode of proceeding detailed, suited to each particular case. All that is aimed at here is, to show, that since the shoulder-joint is liable to several kinds of dislocation, each of which has its peculiar characteristics, and requires peculiar management, according to the change that has taken place in the anatomical relations of the parts; so it is impossible for any one, who has not accurately studied the anatomy of the joint, to treat its injuries upon scientific principles, or with any certainty of success.

The shoulder is very liable to become injured by blows and falls, and to become swollen in such a manner that an ignorant pretender to surgery might mistake such a case for dislocation, and treat it accordingly; the consequences of which would be distressing and dangerous.

Before dismissing this subject, we deem it useful to observe, that the blood-vessels and nerves which take their course through the arm-pit, become sometimes so

much involved in the changes which take place by the head of the arm-bone being thrown out of its socket, and resting upon them, that an attempt to replace the bone has proved fatal. To understand and know how to manage a case of this description, an accurate knowledge of all the parts concerned, is indispensably necessary.

Structure of the Elbow-Joint.

Three bones form the elbow-joint, viz: the lower end of the arm-bone, and the upper ends of the two bones of the fore-arm. The bone which is principally concerned in forming the joint has a long process, or point at its upper extremity, which forms the point of the elbow, and which effectually prevents a dislocation forward, without a fracture of this process.

The only motion which this joint admits of, is flexion, and extension, and owing to this limited motion, and to the peculiar structure of the joint, which indeed is the cause of its limited motion, dislocations here, are much less frequent than those of the shoulder-joint. This joint has also a capsular ligament, which envelopes the heads of the three bones that form it; but the security and strength of the joint depend principally upon the lateral ligaments, which bind the bones firmly together on each side. In every case of dislocation, all these ligaments must be more or less lacerated.

Injuries of the Elbow-Joint.

Dislocations of this joint are not frequent, but they do sometimes occur, and they may be of four different kinds; first, backward; second, forward; third, out-

ward; and fourth, inward. The first is the most common; the second is always attended with a fracture of the process which forms the point of the elbow; and the two last, are extremely uncommon.

There is less difficulty in knowing when the elbow is dislocated, and in determining the kind of dislocation, than in knowing how to manage it. A knowledge of anatomy is here also necessary; for without that, it is impossible to know what injury the soft parts surrounding the joint have sustained, or what particular obstacles are to be overcome in returning the dislocated bone to its place.

The second kind of dislocation, that attended with fracture, as mentioned above, is particularly difficult to manage, and no one can do it successfully, who is not fully acquainted with the structure of the parts, and the action of certain muscles whose office it is to extend the fore-arm; and whose action in this case must be prevented, by scientific and skilful management, or deformity, and a great degree of lameness will be the consequence.

The fracture just mentioned, may take place without dislocation, which is an injury that is followed by an almost entire loss of the use of the arm, if not treated scientifically.

There may also be a fracture of the arm-bone so near the joint of the elbow, as to be mistaken for dislocation by one ignorant of anatomy, and treated as such, to the great distress and injury of the patient.

The elbow-joint, like the shoulder, is liable to suffer from sprains, bruises, etc., in such a manner, that a quack

in surgery might commit a blunder, that would subject the unfortunate patient to an immense amount of useless suffering.

Structure, and Injuries of the Wrist, and Hand.

The wrist is composed of eight bones, which are so closely fitted to one another, and so firmly bound together by ligaments, and tendons, that it is impossible for a complete dislocation of one or more of these bones to take place, without a great laceration of the bands which connect them together.

A partial dislocation, however, of one or more of the bones of the wrist, may take place, which is readily detected and easily reduced by one who understands the structure of the part; but which would be likely to escape the notice of one not acquainted with anatomy, and be treated in an improper manner.

The joint formed by the lower extremities of the two bones of the fore-arm, and the bones of the wrist, is liable to dislocation; and this is a case which ought to be treated by one possessing anatomical, and surgical knowledge, especially if some time have elasped before an attempt at reduction.

The bones of the hand, which are four in number, and very firmly connected with the bones of the wrist, by ligaments, and tendons; and therefore cannot be completely dislocated, without an extensive laceration of these connecting bands. They may become partially dislocated, however, at the wrist-joint; and the same remark is applicable here, as to partial dislocations of the wrist.

The bones of the wrist and hand are not liable to fracture, except from a degree of direct violence, which does great injury to the soft parts, and is followed by swelling and inflammation, which is likely to mislead an ignorant practitioner. Sprains also, and the consequent swelling, effusion, and painful motion of the joint, may easily lead the surgical quack, to suspect dislocation where none exists, and to act accordingly, to the great suffering and injury of the patient.

Structure of the Hip-Joint.

The hip-joint is formed by the round head of the thigh-bone being received into a deep socket of the hip-bone, and is therefore called a ball and socket joint. The hip-bone with which the thigh-bone is connected, is immovably united to the trunk, indeed forms a part of it; so that the motions of the lower extremity are more limited than those of the upper.

The structure of this joint, independently of the ligaments and muscles which surround it, renders it much more secure, and less liable to displacement, than the shoulder-joint. But it has great additional security in the strong ligaments and muscles which surround it. As in other joints, there is here a capsular-ligament which incloses it completely, and is extensively ruptured whenever a dislocation takes place.

Injuries of the Hip-Joint.

The injury to which this joint is most liable, is fracture of the neck of the thigh-bone; for the head of this bone is connected to the body of it by a part called the

neck, which stands off from the body of the bone almost at right angles, and is therefore quite liable to fracture. It is of the greatest importance to distinguish this injury from dislocation, since the means that are proper to be employed in a case of dislocation, are extremely improper in a case of fracture. But even a good anatomist, and an experienced surgeon, may mistake the one for the other in certain circumstances; it must be evident, then, that it would be the height of imprudence to entrust such a case to one destitute of the necessary qualifications.

The head of the thigh-bone is liable to be displaced in four different ways, each of which has its peculiar signs, by which it may be distinguished from the others. It is not necessary that we should speak particularly of these several kinds of dislocation; because all that is useful to the popular reader, is such a knowledge of these injuries as shall make it evident to him, that they are so difficult to manage as to require surgical skill, which can result only from a knowledge of anatomy; and for this purpose, a description in general terms is sufficient.

Owing to the structure of the hip-joint and the surrounding parts, and to the position and strength of the muscles attached to the upper part of the thigh-bone its head becomes so situated after being thrown out of its socket, that a great degree of extending force is necessary to replace it; but unless directed by a knowledge of the facts, and the character and degree of injury which the soft parts have sustained, and the precise obstacles to be overcome, no amount of force that could

be used, would be successful. In each kind of dislocation of the hip-joint, the head of the displaced bone occupies a different position in relation to its natural situation; and in each case, the means employed must be directed accordingly. We have hitherto been speaking of dislocations which are the result of external violence; but there is sometimes a dislocation of this joint, which is the result of disease, a case which none but a scientific surgeon can duly understand and properly treat. There is hardly any case that comes under the care of the surgeon more difficult to manage than this; nor is there any, probably, where the surgical quack is more likely to be employed, or where he is more likely to do injury.

But without dislocation, the head of the thigh-bone is sometimes so affected by disease in its socket, as to cause a lengthening of the limb, which might be mistaken for a sign of dislocation and lead to the use of means for its reduction, which would occasion the patient extreme torture, and perhaps cost him his life.

Structure and Injuries of the Knee-Joint.

The knee, like the elbow, is a hinge joint, and admits only of flexion and extension. Three bones enter into the formation of this joint, namely; the lower extremity of the thigh-bone; the upper extremity of one of the bones of the leg; and the knee-pan. This joint, being extremely liable to the action of those causes which tend to produce dislocation, is well provided with strong ligaments and tendons; all of which are so arranged as to afford the utmost security.

But notwithstanding all these means of security against dislocations, they do sometimes happen, and when they do, so much injury is unavoidably done to the soft parts about the joint, that it becomes a very serious accident, and one from which the patient is a long time in recovering.

Dislocation of the knee-joint may take place in four different ways, and so great is the deformity in each case, that there is no difficulty even to the new pretender to surgery in distinguishing it; but after the swelling takes place, which quickly follows such extensive laceration as always attends a complete dislocation of this joint, it is not so easy to decide upon the nature of the injury. In these cases, as much as in any others that have been mentioned, anatomical knowledge is necessary, in order to their successful management. It is true, that in a case that has just occurred of dislocated knee, before the lacerated soft parts have become inflamed, a sufficient degree of extending force exerted without any exact knowledge of the structure of parts, may prove successful; but it is certainly owing to accident and not to skill that they do so, and no prudent person would risk the management of a serious accident in such a manner, if he could help it. There is often as much knowledge and skill required, in deciding properly upon the question, whether the means necessary for the reduction of a dislocated bone, ought to be employed or not, as in using these means successfully; and in no case is it more necessary to decide this question correctly, and upon the sound principles of science, than in that now under consideration. When, therefore, circumstances

do not absolutely forbid it, none but the scientific surgeon should be entrusted with the management of such cases.

The knee-joint is also liable to sprains and bruises, and to white-swellings, the effects of which might lead an ignorant practitioner to pursue a course of measures, that would be altogether improper, and put the life of the patient to great hazard.

The knee-pan is also liable, both to dislocation and fracture; and in either case, it is best that the treatment should be directed by a knowledge of the structure of the parts concerned, whether unusual difficulties attend or not; but where they are present, it is indispensably necessary.

Structure and Injuries of the Ancle and Foot.

The joint of the ancle is formed principally by three bones, namely; the lower extremities of the two bones of the leg, and one of the seven bones which form the back part of the foot. This joint is made very strong by numerous and very firm ligaments, for no joint of the body requires greater strength than this; but yet it is liable to displacement, and when dislocated, the case frequently becomes very difficult to manage. Compound dislocations here are more frequent than of any other joint, that is, dislocations accompanied with a wound of the soft parts communicating with the joint. These are cases of serious importance, and unless managed in a proper manner, such a manner as is known only to the scientific surgeon, incurable lameness, if not a result still worse, is the consequence.

The small bone of the leg forms the outer ancle, and a fracture of this bone is often associated with dislocation of the ancle, which renders the case more difficult to manage, and consequently the agency of the real surgeon becomes more necessary.

The seven bones which form the back part of the foot, or the tarsus, like the small bones of the wrist, are liable to a partial displacement, and are then easily replaced; but they cannot be completely dislocated, without such an injury of their connecting ligaments, and of the integuments which cover them, as renders the case one of serious importance, both on account of the difficulty of replacing the bone, and of the effects which are apt to follow from the injury done to the soft parts. The remarks that have been made upon dislocation of the long bones of the hand, and upon the effects of sprains, bruises, etc. are applicable to similar injuries of the foot.

The two cases which follow may be considered as fair illustrations of the science, and skill, of natural bone-setters, as well as the ignorance, and susceptibility to imposition, of those who claim at least an ordinary share of intellect.

A young lad of this city received an injury of the elbow-joint, which, under the most judicious surgical treatment, terminated in permanent stiffness. The parents had heard of a natural bone-setter, who had made himself notorious by reputed great feats of skill, and believing him to possess some preter-natural power, had him called to see their unfortunate child. The natural bone-setter, without hesitation, at once declared that the

joint was dislocated; and forthwith preparations were made to "set the bones." The limb had been placed by the surgeon, who attended the boy during his confinement, in a semi-flexed position; and thus it remained till the bone-setter was called in, when no force that could be used with safety was sufficient to straighten it. The bone-setter however, was not to be foiled by any obstacle of the kind; and, augmenting his force in proportion to the resistance to be overcome, he finally succeeded in straightening the limb. This was a great triumph for him, a gratification to the parents, and the most exquisite torment to the poor, suffering, child. But the consequences of this natural foolery, and, on the part of the parents, very unnatural madness, were to follow. The force employed to reduce the pretended dislocation had ruptured tendons, ligaments, and nerves; and, in short, inflicted a far worse injury than the one originally received. The child's life was in jeopardy, and was saved only by the timely amputation of the arm by one of our most distinguished surgeons; and the child is now a living monument of the skill of a "natural bone-setter."

What the feelings of parents are, on such an occasion, they can best answer.

The second case was that of a boy also. This was what is commonly called a *hip-disease*—or, in other words, an inflammation and ulceration of the hip joint. The complaint had existed for some time, and produced a great degree of emaciation of the affected limb, which gave to the joints an unusual prominence; and, as is common in this disease, the limb was in a flexed position.

This patient had been attended by a respectable practitioner, who understood the disease, who was competent to manage it, and who had done all that the art can do in this much dreaded complaint. But the natural bone-setter was sent for. He pronounced the *hip*, *the knee*, *and ancle dislocated;* and straightway commenced furiously pulling at all these joints to get them in place. The boy shrieked, and entreated him to desist. The diseased parts being exceedingly tender, and painful, on the slightest motion, the complaints of the boy only made his tormentor the more confirmed in his opinion, and the more persevering in his efforts to "set the bones." He did persevere till the child repeatedly fainted from such torture; and being fearful that he had *cured the patient to death*, or killed him outright, at length concluded his manipulations, by saying that he had *got the bones all into their places.* The disease was so aggravated by this cruelty that in a few days the child's sufferings were at an end.

Cases like the above might be narrated to any amount, but to recount instances of such reckless ignorance, and cold-blooded cruelty, such savage barbarism, is too revolting to humanity; and the reader is, probably, already satisfied.

CHAPTER XIV.

OF THE COMPARATIVE POWERS OF MINERAL, AND VEGETABLE MEDICINES.

THERE seems to be an universal disposition, among all descriptions of medical quacks, to abuse, decry, and most foully slander, all medicines obtained from the mineral, while they at the same time, extol the properties of those belonging to the vegetable, kingdom. To accomplish an unworthy, or unlawful, purpose with community, it often, if not always, becomes necessary to inflame existing prejudices, and where they are wanting, to excite, and foster such as may best subserve the desired end. That there has been a general prejudice against a few of the mineral medicines—some remains of which are yet too frequently met with—past experience bears ample testimony. Calomel is the great bug-bear—the raw head and bloody bones—that has been used by designing knaves, and others who deserve compassion for their weakness, to frighten those who have been selected as fit subjects for imposition. With Calomel, all minerals have been dragged in, and received the same sentence of condemnation, for no reason but belonging to the same family—for being found in bad company; or, perhaps, for another reason, deemed sufficient by the ignorant, viz. that they are medicines of great power; and, therefore, are capable of doing injury. That medicines of the mineral

kingdom have done mischief by not having been judiciously administered, may be true; and that a prejudice should arise in consequence, is very natural. Such misfortunes have been turned, by quacks, to their own account; they have raised a hue and cry against all minerals, and in the hope of throwing ridicule upon the profession they term us, "Mineral Doctors." They cry *mad dog*, and set out upon the chase; and happy are they if they can succeed in deluding a few weak sisters to join with them in the pursuit, and chime in with their cry. The reason of this uncompromising hostility on the part of quacks, and some of their disciples, to mineral medicines, is, that they are efficacious when employed—and that when misused, they do injury. The same argument, if such a notion can be dignified with the appellation of argument, can be applied to any thing that we eat or drink; or to any power that we employ in the ordinary concerns of life. Fire destroys our dwellings—water drowns us—steam boilers explode and destroy life—horses take fright and run away—excess in eating the simplest viands, produces disease and death; and, therefore, according to the logic of quackery, all these things are to be condemned. If medicines have been misapplied, it would be the dictate of true wisdom to learn a lesson from error, and profit from misfortune, rather than condemn the *thing* for a fault which justly belongs to the hand that administered, or the head that prescribed it.

And if medicines obtained from the mineral kingdom possess such tremendous potency, pray what are vegetable medicines? If minerals are poisonous are vegetables any the less so?

With the word vegetable, are associated many delicious articles of food; and when we are told of a vegetable pill, the idea, perhaps insensibly occurs, that it is something eatable. "Vegetables are nutritious, they are wholesome articles of food; every body eats them, we eat them every day—these are vegetable pills—no minerals here, no poison—they *can't* hurt you, *because* they are vegetable." This is the language and logic of empiricism; and with those who are not at the trouble of thinking for themselves—who close their eyes, and swallow whatever is thrust into their mouths—it is believed with the greatest sincerity. Let the pill be what it may—whether it be the most active, acrid, irritating poison, so it only be called "vegetable," no further questions are asked, and nothing more is desired. Before we proceed further on this subject, we will just state here, that nothing of the mineral kingdom possesses any thing of the activity, or power, that vegetables do—that while minerals require hours, or perhaps, days, to produce fatal effects, vegetables will cause the same result in a far less space of time, or even in a few moments.

We shall now mention a few of the most active of the mineral medicines, and some of those of the vegetable class, and the reader can judge for himself which possess the greatest activity—in other words which are the most poisonous.

Arsenic. This is, occasionally, prescribed in various diseases, and is one of the most violent of the mineral poisons. In Beck's Medical Jurisprudence, the earliest time of which he speaks of death from taking arsenic is "five, six, or ten hours;" and this is probably the shortest

period at which it can take place. It kills by exciting an intense inflammation of the mucous membrane lining the throat and the whole alimentary canal, which terminates in mortification. Death *may* ensue without this inflammation; but this is its general operation.

Mercury. The most active and poisonous of the preparations of this metal is *corrosive sublimate;* but many others may, if too freely administered, induce diseases that may in a short time, or after weeks or months of suffering, terminate in death. Corrosive sublimate destroys life, according to Dr. Christison, in "ordinary cases, in from twenty-four to thirty-six hours;" but it may produce death much sooner.

Antimony. Against this remedy there was once so strong a prejudice that the faculty of Paris procured an edict of the French Parliament prohibiting the use of all its compounds; and they were not restored to favor till one of the kings was cured by its means. Its use was again permitted in 1666.

Tartar emetic may produce death, but not as speedily as corrosive sublimate, or arsenic; it acts by exciting irritation and inflammation. Other preparations of antimony produce the same effect as tartar emetic, though in a much less degree.

Copper. This mineral is but little used, in any of its forms, as an internal remedy. It may produce death within twenty-four hours. It acts as an irritant and causes inflammation.

Zinc. The sulphate of zinc, or white vitriol, is occasionally used as an internal remedy, and is capable of destroying life in the same manner as the one last named.

Nitrate of Silver, *Chloride of Gold*, *and Subnitrate of Bismuth*, are irritating poisons, and cause death. They are seldom used internally.

Iron. The *Sulphate and Muriate*, are irritating poisons, and may destroy animal life in twenty-six hours.

Lead. Only one preparation of this mineral, the acetate, or sugar of lead, is used in medical practice; and those who have used it most deny its ever producing, or being capable of producing unpleasant results.

To this catalogue may be added *Sulphuric*, *Nitric*, and *Muriatic* acids; and these constitute the most active mineral remedies in the practice of the healing art. Let us look now at the vegetable remedies, which are said to be so very harmless, and which, at the same time, are capable of destroying life.

Acetic Acid. (*Vinegar.*) Killed a dog in an hour and a quarter.*

Oxalic Acid. This acid exists in the common sorrel. In its medicinal preparation it has destroyed life in *ten minutes.*† It operates like the other irritating poisons; and, if not taken in sufficient quantities to produce death, it may leave a diseased state of the alimentary canal similar to that induced by the mineral poisons.

Prussic Acid. This is the most deadly poison known. *One or two drops has killed a strong dog in a few seconds.* Hufeland relates that a man, about to be taken up as a thief, took prussic acid, staggered a few steps and fell. The pulse could not be felt, and there was no

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* Beck's Medical Jurisprudence, Vol. II. p. 304.

† U. S. Dispensatory, p. 1093.

trace of breathing. In a few minutes there was a single violent expiration.

Orfila states that a servant girl swallowed a small glass-ful of alcohol saturated with prussic acid. In two minutes she fell dead.

A chemist in Paris applied a bottle of the acid to his nose. Alarming symptoms immediately commenced which continued throughout the day.—(Beck.)

Bryony. "Pyl mentions a fatal case from taking two glasses of an infusion of the root to cure an ague."

Elaterium. (Wild cucumber.) This is so violent a cathartic that medical men seldom use it.

A case is related in the Boston Medical Magazine, and quoted by Dr. Beck, of a female in that city who took six pills of elaterium and rhubarb by the advice of a quack making in all, 2½ grains of the extract of elaterium, and 16 of rhubarb. She died in thirty-six hours after taking the last pill.

Colocynth. (Bitter Apple.) This produces violent and incessant vomiting and purging, and death in twenty-four hours.

Castor Oil. The seeds from which this oil is extracted are capable of producing inflammation, ulceration, and death.

Croton Oil. A half a drop of this operates as a violent cathartic. Two or three drops rubbed over the skin of the abdomen will also cause purging.

Jalap in large doses is an acrid poison.

Savin. This excites inflammation and causes death.

Poison Oak. (Ivy.) When applied to the skin this excites a violent inflammation accompanied with an

cruption of pustules. We have seen its effects remain in the system for years.

Poison Sumach is still more deleterious than the last named *vegetable*. It almost equals in virulence the Upas-Tree; for it causes inflammation of the face and eyes, terminating in blindness, by only handling it, or being in a room where it is burning on the fire.

Lobelia. (Indian tobacco.) An acrid poison. Horses and cattle are killed by it; and it often destroys life in the hands of botanic quacks.

Opium. This drug and its various preparations belong to the class of narcotic poisons. They cause death in a few hours. Every one knows that the habit of taking opium acts upon the system like a slow poison, destroying the health, undermining the strength, annihilating the mental faculties, and rendering the individual a mere vegetative animal—incapable of thinking, and scarcely of moving. It is incredible to what extent this drug may be taken by those who have been long accustomed to its use. A single grain is an ordinary dose when taken medicinally; and the effects of this remain for twenty-four hours or upwards. But, after a time, the quantity may be increased to drams, or to an ounce, and even to a larger amount still—and this is persevered in for years, perhaps, before the system finally succumbs to its poisonous influence. It is related of the celebrated Coleridge that, for a long time, he took daily a pint of laudanum; this is equivalent to one ounce of solid opium, and a pint of ardent spirits. It is stated by Madden in his travels in the East that a regular opium eater seldom lives to be more than thirty years of age.

Hyosciaums. (Henbane.) A narcotic poison ; and like opium kills in a few hours.

Solanum. (Nightshade.) A narcotic poison.

Strong Scented Lettuce. The same as the last named.

Cherry Laurel, *Peach Blossoms and Leaves*, and bitter almonds are poisons. Their deleterious property being the prussic acid which they contain.

Wild Cherry, and *Black Cherry*, both contain the prussic acid and occasionally kill animals.

Wild Orange is poisonous, and cattle that feed on its leaves are killed.

Bitter Almonds. The essential oil destroyed a cat in five minutes.

Peach Kernels. These are distilled for the purpose of impregnating the *noyeau* cordial. Beck says the late Duke of Lorraine nearly lost his life by swallowing a small quantity of the liquor.

Belladonna. (Deadly nightshade.) Very properly named *deadly.* A detachment of one hundred and eighty French soldiers ate of the berries of this plant, many of whom died.

The following articles are ranked by Dr. Beck, in his Medical Jurisprudence, among the poisons ; and he gives instances of fatal results from the use of each one.

Datura Stramonium. (Thorn Apple.)

Nicotiana Tabacum. (Tobacco.)

Conium Maculatum. (Hemlock.)

Cicuta Virosa. (Water Hemlock.)

Cicuta Maculata. (Snake Weed.—American Hemlock.)

Œnanthe Crocata. (Hemlock dropwort. Dead tongue.

Æthusa Cynapium. (Common fool's parsley.)

Chaerophyllum Sylvestre. (Wild Chervil.)

Sium Latifolium. (Procumbent water-parsnip.)

Aconitum Napellus. (Monkshood, Wolfsbane, Aconite.)

Helleborus Niger. (Black hellebore.)

Veratrum Album. (White hellebore.—Indian poke.)

Colchicum Autumnale. (Meadow Saffron.)

Digitalis Purpurea. (Purple Foxglove.)

Scilla Maritima. (Squill.)

Ipecacuanha.

Ruta Graveolens. (Rue.)

Anagallis Arvensis. (Meadow pimpernel.)

Aristolochia Clematitis. (Common Birthwort.)

Nerium Oleander. (Common Oleander.—Rose-Bay.

Asclepias Gigantea. (Milkweed.)

Mercurialis Perennis. (Mountain Mercury.—Dog's Mercury.)

Strychnos Nux-Vomica. (Vomica Nut.—Quaker Buttons.) Sometimes called "hop up." It is used to poison dogs, and kills in a very short time.

Strychnos Ignatii. (Bean of St. Ignatius.) Its operation is similar to nux-vomica.

Laurus Camphora. (Camphor.)

Cocculus Indicus. (Indian Cockle.)

Coriaria Myrtifolia. (Myrtle leaved Sumach.)

(Mushrooms.)

Secale Cornutum. (Ergot.—Spurred Rye.)

(Spurred Maize.—Indian Corn.)

(Diseased Wheat.)

(Darnel.)

(Alcohol.)

The essential oils of tansy, winter-green, cedar, and others of this class.

There is also obtained from the common potatoe vine, by evaporating the expressed juice, a most powerful narcotic, which is used as a substitute for opium, and which, doubtless, is capable of producing death in no very large dose. There is a narcotic principle in the *hop* also deleterious, and fatal to life.

A very active cathartic is obtained from the common butternut.

The catalogue of poisons, and active remedial agents, belonging to the vegetable kingdom, might be increased to infinity; and the one here given, though somewhat extensive, is extremely limited.

It has not been our intention, by presenting this, to frighten the reader by showing him that *medicine* is but another name for *poison*. But we did intend to teach him that the cry in favor of "vegetable" medicine was the song of the syren; and we hope he has learned that "vegetables" are not the innocent, harmless things that a set of notorious impostors would fain make the people believe. They are as useful and as valuable as any medicinal agents; and to prescribe them requires great skill and more science than usually falls to the lot of an ignorant empiric.

CHAPTER XV.

OF THE ERRORS, EXCLUSIVENESS, AND ULTRAISM, OF MEDICAL MEN—AND THEIR INFLUENCE IN CAUSING AND PERPETUATING EMPIRICISM.

The age in which we live, is, most emphatically and truly, an age of improvement. When we look at the world, as it is at the present day, and contrast it with its previous history, we shall have the most perfect demonstration that the onward progress in the arts and sciences, as well as the more immediately useful inventions in mechanism, has been vastly greater, since the commencement of the nineteenth century, than during a much longer space of time, at any other previous period, in the history of man. The perfection that has been given to the steam engine, and its various applications, which, in its turn, is in a fair way to be eclipsed by the discoveries in electro-galvanism, has wrought most miraculous changes on our planet; it has in a measure superseded manual labor, and has so approximated distant regions, and opposite climates, that time and space are nearly annihilated. Stepping back a little into the last century, we shall find that political revolutions, such as the world never before witnessed, caused by the growth and diffusion of liberal sentiments and information, have changed the aspect of states and nations, and disseminated light and knowledge, where they had not

before existed. In fact, all the changes and improvements of the present day are owing to the diffusion of knowledge; they are but the legitimate effects of a powerful cause—*a lever which moves the world.*

Christianity has extended her influence to almost every heathen nation; and by the Gospel, and the arts and improvements of civilized life, the thick clouds and mist of ignorance and superstition are dissipated, and man is made to attain the eminence which his Maker designed. The healing art, amid the general march of improvement, has by no means remained stationary, but has made rapid, and astonishing strides to perfection.

But, however pleasing the contemplation of the progressive improvement in the condition of the human family may be, yet, the view is not one of unobstructed sunshine and beauty. Every new thing, or novel project, is not an improvement, and every innovation, is not a useful invention. With the valuable ore in a recently discovered mine, there is often blended something that is worthless, or that spoils the metal. If this age is characterized by improvement, the march of intellect, useful inventions, and boundless benevolence, it is no less strongly marked by the wildest extravagance and fanaticism. Whatever scheme is undertaken, whether for the profit or pleasure of ourselves, or for the good of others, is carried far beyond the bounds which true philosophy would assign to it. Religion, politics, the desire of amassing wealth in various ways, the rage for speculation, temperance, abolition, etc. all rage with the violence of a tempest. They are pushed by their advocates to extremity, and not unfrequently, to a remarkable degree

of absurdity. An abstract principle, right and good, and pure in itself, and productive of the best fruits when wisely acted upon, is adopted; and without regard to the individual cases to which it may be applicable, or careless of consequences, or the circumstances which modify its operation and influence, it is made the *primum mobile* of all subsequent conduct. Like a quack medicine, that is extolled as a sovereign cure for all the diseases that flesh is heir to, or any valuable remedy in the hands of an empiric, an abstract principle is universally applied; and if mischief results, the blame is attributed to any thing else, rather than to the unskilfulness, or ignorance of him who administers the remedy. The exclusiveness and ultraism of the present age, is the result of that principle which led Napoleon to such astonishing success in his military career, and by which he achieved his multitude of splendid victories. It is the concentration of force—the union of effort—and an undivided attention to a given object—which is certain to ensure success, where that is practicable, in any undertaking, or enterprise, and which is equally certain to degenerate into the wildest extravagance, and the most grievous error, when the aim is misdirected. Much of the improvement, and extravagance of the day, is, no doubt due to the study of a single subject—to the devotion of genius to a particular pursuit—which begets an exclusive, ardent, enthusiastic, and almost delirious attachment to the subject which so engages the mind. Beneficial results will, most assuredly, ultimately flow from the errors and vagaries that are manifested, as well as from the discoveries that are made, and the truths that are developed; but not till the errors

are perceived, and duly appreciated; they will then stand as landmarks to the pilgrim of science, or as beacons on the hidden rocks and quicksands, warning the mariner of unseen danger. A succeeding, rather than the present, generation will profit by the truth and the error that we shall leave behind us; they will reap the fruits of our labor when time, the only true test, shall have refined the ore, and the dross shall have become separated from the pure metal.

The preceding remarks are peculiarly applicable to the medical profession. We have made discoveries and improvements of the greatest benefit to our species, and such as will be hailed with gratitude and joy, while our nature is heir to infirmity and disease, and while medicine shall be cultivated as a science, or followed as a profession. We have made innovations that startle for a season, but soon sink with their authors into merited contempt and neglect—and even the most valuable of our improvements are in danger, from the too ardent zeal of their friends, of being considered as worthless, and cast into the sea of oblivion. Like the principle of temperance, which is right in theory and practice, as far as it is necessary for health and comfort, or expedient for morals, it may be led to include every article, either of food or drink, whose abuse in the hands of the unprincipled or unthinking can by any possibility do harm. Exclusiveness and ultraism seem to be the order of the day in medicine, as well as in most other things; but there is one thing which exclusives would do well to remember—and it is this—*that a good thing may be urged so far, as to render its rejection certain.* Most well regulated

minds refuse to accede to a proposition, although it may be based upon truth, whose tendency is to exclusiveness; and spurning the narrow bounds prescribed them by a want of philosophy, they refuse to acknowledge the frenzy of a zealot, or the dogmas of a master.

If we consult the history of medicine, we shall find that the most opposite theories have existed at the same time, and have each been most zealously defended by their advocates; and these, again, have given place to others, with almost the frequency and regularity that one crop of vegetation is succeeded by another, which have been as warmly praised, and as soon exploded and forgotten as their predecessors.

Among those who have been contending for victory and notoriety in our profession, there have occasionally been seen some honest labourers after truth—those whose primary object it was to clear away the rubbish of former theories, and amid their wreck, to seek whatever material there might be fit for a more durable edifice, and lay its foundations upon a wider, firmer, and more permanent, basis. The theories that have been framed to account for the proximate cause of typhus fever, and the consequent treatment of the disease, may be adduced to illustrate the fate of all, or nearly all fabrics of a kindred character. The humoral doctrine of Boerhaave, was succeeded by the nervous doctrine of Cullen, whose splendid reign was in its turn terminated by the appearance of the cerebral doctrine of Clutterbuck, which was again destroyed by the omnipresence of the gastro-enteric doctrine of Broussais; whose glory is already suffering a partial eclipse by the dothinenteric doctrine of Bretton-

neau, Bouillaud, and others of the French masters.* The contrariety of practice consequent upon such discrepant theories—"the antiseptics and antacids of one school, the anti-spasmodics and diaphoretics recommended by another, the cordials and stimulants by a third"—whilst the whole of these remedies are condemned by a fourth class of physicians, whose chief remedy and sole hope, consists in leeches to the head, or some region of the abdomen, etc. is but a fair specimen of the uncertainty, and fluctuation, that has ever attended the practice of the healing art. Such an aspect of affairs may well excite the attention of a philosophic mind, and raise the trite, but important, query, "who shall decide when doctors disagree." It is needless in this place to take a more extended view of the multitude of theories that have prevailed since medicine became a science; they have all shared the same fate, and like other remnants of antiquity—like the Indian mounds in the distant West of our own country—or the crumbling walls, and moss-grown ruins of other lands—serve as mementos of past ages.

Many of the causes which have heretofore operated to retard the progress of medical science, have in later days lost much of their influence; and it has now received such an impulse that its career must be rapidly onward. Closet reasonings, dreamy speculations, and

* Boerhaave taught that fever was the result of a depraved state of the blood—Cullen, that it was an affection of the nervous system—Clutterbuck, that it was located in the brain—Broussais that it consisted in an inflammation of the mucous membrane of the stomach, and upper portion of the alimentary canal—while Brettoneau and Bouillaud now teach that it consists in the inflammation and ulceration of certain glands in a portion of the alimentary canal.

conclusions drawn from false, or assumed facts, have, in a great measure, yielded to the Baconian or inductive philosophy. Experiment has superseded conjecture—and experiment and fact are now, more than at any previous period, the foundation of theory, instead of theory being the foundation and ground work of fact and experiment. To this reversed method of reasoning, which has led to the cultivation of morbid anatomy, and to close observation, is to be attributed most of the great improvements in medicine which bless mankind.

The object at present is to take a glance at the state of medicine as it exists at the present time, and to notice briefly some of the causes which operate, among the members of the profession themselves, to obstruct its still more rapid advance to perfection; as well as to consider the influence they exert in causing and perpetuating quackery.

The extension of Pathological research, if it has not laid the foundation of a system, denominated the Physiological system, has at least contributed to bring it to greater perfection. A knowledge of Pathology, or of the nature of disease, and the changes it induces in the different tissues, is indispensable to its successful treatment—it is what our fathers aimed at; what they guessed at; and what they sought for; but what they seldom attained; and to the adaptation of their practice to the disease, either from knowledge or accident, they are indebted for whatever success they met with. Pathological research has removed many of the impediments that obstructed our course in the study and practice of our profession; and although our way is by no

means clear and free from difficulties, we may yet, with due caution, proceed with a firmer and a bolder step. As it is one of the frailties incident to our nature that the mind is apt to leap from one extreme to another—and at different times to derive diverse conclusions from the same premises,—so it has been true to itself in exhibiting its character for inconsistency, as well in matters pertaining to medical science as in others of, perhaps, much less importance. A great part of the medical world is led captive by the brilliant and seductive *discoveries*, and the exclusive pretensions of the French reformer Broussais; but while we consider him the great medical reformer of the age, we would not unhesitatingly pronounce him infallible, or yield implicit credence to all his articles of faith.

There are, and probably always will be, those, who believe in the doctrine of essential, idiopathic fevers, specific diseases, and contagion; and while they would in some instances do mischief, by the mal-practice resulting from their erroneous theory—by doing too much; a Broussaian would be guilty of no less evil, by following out the practice prescribed by his own theory—by doing too little—or by omitting to do what circumstances might imperiously demand should be done. While Broussais teaches that the alimentary canal is the centre and focus of all irritation—and that in its lining membrane is located an inflammation in all febrile complaints —that, in short, a "gastro enterite" is the *fons et origo mali*—and that leeches or cups, and gum water and "lavements," constitute the only proper treatment—we

may expect nothing else than that the practice of his disciples should degenerate into an inert, inefficient routine, and that their patients should fall a sacrifice to—scientific speculation?—NO—*professional trifling*.

We shall not take it upon us to decide the question whether or not, where there is a general excitement, the local disease of the stomach and bowels be a primary, coincident, or secondary, affection; but we may well doubt whether such a disease *always* exists at such a time, and that it continues till all febrile symptoms are subdued. But granting that it is invariably present, and that this is the disease itself to which are owing all the symptoms, our doubts are redoubled when we are called upon to believe, and subscribe to, the ultraism and exclusiveness of the Broussaian precepts in relation to practice. Broussais is entitled to the everlasting gratitude of posterity, for his indefatigable labour in Pathological investigations, and for the facts he has accumulated; but many of the practical inferences deduced from his conclusions lead inevitably to the most inefficient, and empirical routine. Medicines that have heretofore been found to do good, in the most positive and direct manner, in a given disease, are, under the same circumstances, condemned as irritants, and, in the opinion of the disciples of Broussais, likely to increase or excite "gastro enteritis;" and the accumulated experience of past ages is regarded by them only as a mass of antiquated error. A long course of close observation must lead to some definite conclusion; and when a course of medical practice has, under given circumstances, produced the same general result, we may safely infer that, under the same, or

similar circumstances, it will continue to do so—and it should not be considered as fully disproved merely because it does not happen to square with some preconceived theory, or some fanciful speculation.

The doctrine of Broussais, it is well known—or the doctrine of those who have out-Broussaised their great master himself—admits of no specific disease; small pox, according to their creed, is but an inflammation and suppuration of the skin; measles, an inflammation of the mucous membranes and skin; and scarlatina something of the same kind; and all are preceded or attended by a "gastro-enterite," and all are to be cured by depletion and demulcents. We may not all attach the same meaning to the term *specific;* but it is sufficient, on the present occasion, to say that there is something peculiar in these diseases as well as in some others—that they have characters which are not possessed by other diseases—and that it remains to be yet proved that they are even entirely cured by a disciple of the Physiological, or any other school, by any kind of treatment, without running a determinate or *specific* course. Their violence may be abated; they may indeed be rendered comparatively mild, by a proper treatment, but they cannot be arrested in their progress, and permanently cured like simple inflammations, by any course that the genius of man has yet devised. From Johnson's Medico-Chirurgical Review, for July 1835, we make the following extract, which goes to prove that fact comes in collision with the theory in question. "I cannot," says M. Pelletan, the reporter, and he doubtless expresses the sentiments of his precep-

tor, Prof. Bouillaud,* "now boast, as I have hitherto done, of the utility of the anti-phlogistic depleting course of treatment in small-pox; there is a something else, besides mere inflammation, present in this disease. This *something* is of a specific nature. The blood has become altered in its qualities; for, if we examine it after it has been drawn from the arm, it will be found to be not firm and dense, as in genuine inflammations, but soft, diffluent, and having all the characters which it usually presents in typhoid enteretis." We cannot forbear to add another quotation from the same Journal, for it contains the sentiments of Prof. B. himself, and under his own hand and seal. "The danger of measles is always proportionate to the severity of the accompanying bronchitic affection; but let it not be forgotten that the anti-phlogistic treatment, although the only safe practice in such cases, has not the same control over the pulmonic complication of measles (which, and such like varieties of the disease, might be appropriately called "peripnumonia notha," instead of the subacute form in old people,) that it exerts over the open and idiopathic inflammations of the lungs." (pp. 196—7.) His reviewer adds, "this is an important concession on the part of a Broussaist. We may soon expect a considerable modification of the original tenets of this talented but one-sided physician."

It is by no means our intention to review Broussais; but merely to take so much notice of him as to show the tendency of his doctrines to run into exclusiveness and ultraism in practice. To say that little or no active medicine should be given, by the mouth, in fever—or as

* A Broussaian dyed in the wool.

Broussais would have it—in "gastro-enterite"—is to say that the disease would in all cases be made worse by it; an assertion that is, oftentimes, at direct war with fact. Medicines should at all times be cautiously administered, even when most unequivocally indicated, and when found to disagree, or produce no decided good result, should be discontinued; but when a mass of weighty and unquestionable authority is adduced going to prove the direct utility of medicine in a given case—even in the omnipresent "gastro-enterite"—the lovers of gum water and leeches, the Sangrados of the nineteenth century, may at least pause and give it a candid hearing. It may be conceded to the ardent Broussaians that their doctrine is in many, and perhaps a majority of cases correct—that they are also right in affirming that too much medicine is generally given when the stomach is in an irritable state—and that their *principle* of practice is the only true and rational foundation for the treatment of disease. But on the other hand, if there is any weight in human testimony, something should be yielded to those, who deny to the gastro-enteritic school, the exclusiveness and infallibility which they are not backward in assuming.

One reason why the doctrine of Broussais is so eagerly and so generally embraced as it is, and finds such zealous advocates, we believe to be its compatibility with, and congeniality to, indolence. It is all easily understood, both theory and practice; the stomach is the centre of all disease, and the treatment consists in bleeding, leeching, cupping, demulcents, and lavements, with perhaps the application of a poultice or a fomentation of hot *milk and water*. All thought and all reflection are

unnecessary—the work is plain, and if physiological treatment, as a Broussian understands it, cannot save the patient, nothing in the world can.

To notice more minutely these or any other sects in the profession would be needless, were this, indeed, a fit occasion; and these are introduced rather as specimens of the divisions, and different opinions, of the medical world, with a view to direct attention to the subject as it shows to what extent exclusiveness, and utopian doctrines may prevail. In addition to these general diversities of sentiment individuals differ yet more—so that their contrariety of opinion has become proverbial. In many cases of disease it matters little what the theory of the physician may be; common sense, if he but gives heed to it, will be to him so faithful a guide that he will not materially err; and were the patients ever left to themselves they would ultimately recover. But it is in the comparatively few cases, those of an anomalous and complicated character, that the value of science is duly estimated, and the skill of the physician put to the true test—it is here that closet speculations, and exclusive theoretical notions, are of little avail in arresting the slow, but certain progress of disease, and in averting threatened danger. How often is it that a patient is rescued from the very grasp of death by a course that one medical sect would condemn as being sure to do irreparable mischief—thereby proving the importance of not being spell-bound by the charms of an exclusive theory. We may exhibit this idea a little more clearly by illustrating it with a case.—A child two years old had an affection of the brain which threatened to terminate

in effusion; it had been most judiciously treated by leeches, warm bathing, cold to the head, revulsives to the extremeties and *epigastrium*, etc. with little or no amelioration of the complaint. The case had been treated by not an obscure member of the profession, and when it reached this stage he declined doing any thing farther, and told the parents of the child that it must inevitably die. It was proposed, by a brother practitioner whom he had asked in to see the patient, to blister the neck and administer calomel. To this he objected, saying that the irritation of the blister would be transmitted to the organ already affected and increase the disease—that the calomel would stimulate and irritate the gastro-intestinal mucous membrane, and also by sympathy affect the brain; but the doctor offered to relinquish the case, choosing that it should either terminate fatally according to his views, or recover under the treatment, and in the hands, of another. The blister was applied, and the calomel administered to the extent of two grains every hour or two—the symptoms were soon mitigated, and the patient entirely recovered.

Bleeding as a remedial agent, is one that has been warmly praised and as warmly and unequivocally condemned. Its injudicious, but ardent friends, have practised and recommended it in almost every stage of almost every disease to which man is obnoxious; and by their untimely and indiscreet praises, they have forced suspicions upon the minds of their brethren, of its universal sanitary powers, which have resulted in a disbelief in its efficacy, and in its disuse. One practitioner of eminence will tell you—and we could, were it expedient,

enumerate multitudes of instances—could quote names without number—that most diseases need not necessarily prove fatal were bleeding performed as early as it should be and carried to a sufficiently great extent. One says that he has had four hundred cases of a disease—that he bled early, and largely, and repeated his bleedings—that he lost but few patients, and those few in consequence of neglecting to apply the remedy to a proper extent. Another, in the same region of country, and under similar circumstances, will tell you that he has had the same number of cases of the same disease—that he too bled early, and largely, and repeated his bleedings—and that nearly all the cases thus treated proved fatal—that the remedy, decidedly, in a majority of cases, was injurious—and that nearly all whom he subjected to a different treatment recovered. Were a man to believe all that a lover of the lancet, or an admirer of phlebotomy should tell him, he would inevitably come to the melancholy conclusion, that were he afflicted with disease, he must infallibly die were he not almost bled to death as a means of saving his life. And again were he to hear the opinions of one who dreads the sight of blood, and errs in the other extreme, and were he to believe what such a practitioner says, he would as readily conclude that life itself would be drawn with the blood, and that with the extinction of his disease he must cease to exist. The inveterate theoretical bleeder will bleed in the most opposite states of the system; he will bleed to check the circulation when it is too rapid, and to subdue febrile excitement—when the circulation is depressed he will bleed to restore it, and to increase the

heat of the body when it is below a healthy standard—he draws blood to subdue reaction, and to excite it—he calls bleeding a sedative, and again he says it is a stimulant—with such a man bleeding is a *sine qua non*—it is almost food and drink, and is about equivalent to vomiting and purging—it is refrigerant in summer, and calefacient in winter—a hobby which he rides either rough or smooth shod.

When the question was put to an ancient orator as to what was most necessary to constitute a good speaker, he replied *action;* when he was asked what was next most important, again he replied *action;* and when the question was reiterated the third time, the third time he replied *action.* Were a modern Sangrado asked what was most necessary in the treatment of disease, doubtless he would reply, *bleeding;* should the question be repeated, undoubtedly he would repeat the same answer; and should it be reiterated the third, or to the thirtieth time, the same answer would be as often returned, unless, perchance, it should be varied to "*leeches*," "*gum-water*," "*absolute diet*," or "*lavements.*" Were the question, on the other hand, what he considered the most hurtful measure in the treatment of disease, put to his antipode in practice, his answer would as certainly be *bleeding;* and were the question repeated any number of times, the same answer would be invariably made. The error in this case lies equally with friend and foe; the extravagant praises of the one, and the unconditional condemnation of the other, are in the same degree unmerited, and unphilosophical, and unbecoming a member of the medical profession.

There are also, even in the reign of "gastro-enterite," ardent friends and admirers of emetics; and the instances of patients who pass through their hands without a taste of tartar emetic, are as rare as those who come from the discipline of a thorough Broussaian, without his fill of *gum-water*, or without carrying the marks of the scarificator on his epigastrium. Emetics are administered for a pain and irritation of the stomach, and they are repeated to remedy the pain and distress which they create. Like a mass of fuel thrown upon a fire, which, for a time is checked, and then bursts out with tenfold rage, emetics may temporarily smother a disease which will reappear with increased violence. This is particularly the case with gastritis in all its grades, and if the disease prove fatal, as it not unfrequently does, under a repetition of this treatment, the doctor does not recognize the instrumentality of his own hand in the production of the final result. He believes, in the innocency of pure intention, and in the simplicity of his understanding, that, if his favorite remedy had been employed to a greater extent, his patient had been saved, and his own skill and the reputation of his medicine, had not been questioned. Another, on the contrary, would hardly administer an emetic, under any circumstances; for he too believes, in all honesty and sincerity, that they must inevitably and without exception, cause gastritis when it does not exist, and aggravate it when present, and always leave the patient worse than it found him. Not long since a practitioner, who had the most inveterate fear of emetics before his eyes, was applied to by a patient who complained of pain, tenderness, weight, and other symptoms,

which, to him, clearly indicated *gastritis;* the usual treatment was, of course, pursued for several weeks—leeches, poultices, cupping, starvation, etc. with no good effect. The patient repeatedly urged to be allowed to take an emetic, but his physician as often placed before him the great danger of so rash and hazardous a measure. At length the doctor was surprised, after the lapse of two days, to find his patient so greatly improved; his disease seemed entirely gone, and he was in fact well. This afforded the doctor a fine opportunity to extol his exclusive theory, and the happy result of his practice, in an oration of half an hour's length; but he was effectually silenced when his patient told him that he had clandestinely taken a large dose of tartar emetic and ipecac, and from the moment of its operation he felt himself relieved.

Neither have cathartics escaped a due share of exaggerated praise and condemnation—the love of friends, and ill will of enemies, proving about equally injurious, as well in relation to medicine as in regard to most other matters. We have too frequently, and what candid man has not, seen cathartics prescribed when they were decidedly indicated, and repeated till all the good they could do had been done, and then continued till the disease they had been intended to relieve had been aggravated, or one of a worse character induced. Purging is many times continued till a sub-acute entritis is induced, or aggravated, and the abdomen becomes painful and distended; and than it is still further continued, under an erroneous impression that a new disease has occurred, to remove the very symptoms it has caused. Thus the patient is finally purged out of existence, without the

doctor once suspecting a possibility that he may be wrong, or that something else, or some other treatment, would be advisable. The error of superpurgation is quite likely to occur in affections of the skin; cathartics operate as revulsives, and aided by the close sympathy between the skin and the mucous membrane of the alimentary canal—caused by similarity of tissue and function—they unexpectedly transfer the disease from the surface to the interior of the body—an event which is always to be dreaded, and if possible avoided. We have thus seen erysipelas, by a repetition of cathartics, transferred from the skin to the bowels, prove fatal in twenty-four hours.

Besides the division of the medical world into particular sects, and the devotion to exclusive theories, and the practice founded thereon, particular articles of the Materia Medica have, also, from their first introduction into use, to the present time, been highly extolled on the one hand, and equally censured on the other. In this respect, the history of one, is the history of all; each has, in its turn, experienced revolutions, which have at one time elevated it to the pinnacle of favor and confidence, and in a brief space plunged it into disgrace and neglect. Medicines which are by some considered of the utmost importance in the treatment of disease, are by others deemed useless or positively injurious, and deserve to be striken from the list of remedies; while others, of acknowledged efficacy and usefulness, it is thought by a few, may be entirely dispensed with, and a substitute employed.

The principle of adopting substitutes in medicine, its tendency and ultimate results—the proposal to reject one article and supply its place with another, deserves a most

careful consideration. In the first place, the want of success in our practice is, at least, circumstantial evidence that we can do none too much good with all the remedies now in general use; and by curtailing our powers—by limiting our means, we circumscribe also in an equal proportion the probability of accomplishing the end and aim of our profession. It must be remembered that no one article is universally condemned—each has its friends, who bear positive testimony to its good effects, and, according to the laws of evidence, we are bound to yield due credence to their testimony—we must, therefore, believe that the different articles in the Materia Medica are useful, and that by expunging them we banish what is sometimes an important and necessary aid.

In the second place, it must also be remembered that a great majority, we may safely say, of the most potent articles now in use are condemned to perpetual disgrace and disuse by nearly equal authority. One says that a certain article is injurious and should never be employed, and quotes numerous cases to prove his assertion; but he recommends a most excellent *substitute*. Another extols the condemned remedy and quotes cases to prove that he is right, and is in no wise sparing of his censures of the proposed substitute; while a third will maintain that both, under given circumstances, are equally useful and indispensable, and will, therefore, reject neither. Were we thus to go through the whole Materia Medica and reject such articles as are condemned, on good authority, as unworthy to retain a place in it, we should at last find ourselves without a single remedy with which to combat disease—like a soldier who goes into battle with

not a solitary cartridge, or any weapon to defend himself. And, on the other hand, were we to replace the expunged articles by substitutes, recommended on equally good authority, we should have all our disgraced remedies restored to favor. We may therefore infer, that testimony and theory, no matter how respectable or plausible, that leads to the above exclusive results, is false and inconclusive. The simple fact that we are often compelled to use a succession of remedies of the same character proves that we have none to dispense with—that all should be retained to be used as occasion may render necessary.

Again it may be questioned whether any two articles are so nearly alike in their properties and effects that they can, under all circumstances, be substituted for each other. To admit this we must admit that two things may be alike, and yet not alike—that after the very best thing is found, there is still a better in the estimation of some. This may be more clearly illustrated by taking a single article and tracing it through its phases of popularity—and we will select one of a conspicuous character, one which has received of late many thrusts and stabs, and sly shots, and encountered the open and manly attacks of its enemies—we mean ALCOHOL.

In speaking of this article it is necessary to premise that the writer of these pages adopts the principle that alcoholic liquors in any form, and under any name, are entirely unnecessary in health; and that in all cases, if used to any considerable extent, they are productive of mischief. But it is well known that there are those who occupy elevated places in the medical profession,

and who exercise a commanding influence, who would have alcohol, in all its forms, expunged from the catalogue of remedial means, and if possible striken from existence—completely annihilated. In relation to the abuses of this article, and the immense evils it has wrought in the world, we can, on this occasion, have nothing to say. The principle of condemning any thing of marked and extensive utility, merely because it has been abused and perverted to work misery and death, requires a small share of dispassionate, and philosophical consideration.

No one but a fanatic doubts the power and efficacy of alcohol, and in many instances its good effect at least, if not absolute necessity in prolonging or saving life; and most practitioners who allow themselves to be guided by common sense, common observation, and common experience, can bear evidence to its usefulness where nothing, within their knowledge, could have been substituted in its place—when nothing else would have been as good. The question now occurs, whether this article shall be expunged from the materia medica, and some persons allowed to die for the want of it, because some others die from its excessive use? Shall the life of one be sacrificed because another sees fit to commit suicide? If this principle be a true one, it must hold good in relation to other things as well as to alcohol—and we shall then find our greatest blessings wrested from us, because they have been perverted and abused, by the blind zeal of a band of fanatics. What has caused a greater sacrifice of life, what more bloody wars, more deadly hate, and bitter persecutions, what greater horrors, and more fearful calamities than the Christian Religion—not the *Christian*

Religion—we would not be so blasphemous. But such results have sprung from its perversion and abuse. And where shall the blame be laid? Or shall the Bible, and Christianity itself, be utterly rejected and abolished? Man, and all that pertains to him in this world, since Adam's transgression, have been marked with frailty and imperfection; and it has been wisely ordained that the abuse of every good thing, shall invariably be followed by an unpleasant result. To reject one blessing, because it may be perverted into a curse, argues weakness, the greatest indiscretion, and a lack of philosophy; for by the same reasoning nothing could escape the same condemnation. We should rather, like the bee, learn to extract sweet from bitter—we should retain for our use the good and reject the bad; and if a thing is positively, and universally, injurious in health, ought we not rather to consider that as an indication that it was meant for our good in disease? The author can, therefore, see no reason why alcohol should be abandoned as a remedial agent; and, as to a substitute, he positively denies that there is any thing like it, in nature or art, or that can take its place.

A moment's consideration in regard to another position assumed by some medical men, in relation to this article, and we leave it. It is asserted that alcoholic drinks are not only unnecessary in health, but that in all cases, and in the smallest quantities, they are positively injurious. It is also said that it is not the last glass of liquor that kills an intemperate man, but that every glass which the man has ever drank, aids in doing this. This is an assertion of the boldest kind, and one which cannot be substantiated

by the least shadow of proof drawn from any law regulating the animal economy, or based on any principle of physiology. If this is true in regard to alcoholic drinks, it is no less true in regard to food, or any of the necessaries of life—which, in any small quantity more than is absolutely required by the wants of the system, must tend directly to the production of disease. Every thing, which is not positively essential to life, must tend to its destruction. To reverse this assertion, and place the subject on its true ground, it is only necessary to remember that the system is provided with organs whose duty it is to guard against causes, the effects of which are likely to prove injurious. The Omniscient Creator of our bodies knew where man would be most likely to err, and in what manner he would be most apt to destroy the work of His hands; and to render His own productions more complete —to provide against emergencies—to remove the principle of destruction which, otherwise, the body must carry in itself, he has wisely provided an apparatus, and subjected the whole machine to such laws that they shall, to a certain extent, obviate all causes of disease. Thus the body may enjoy health in a high or low temperature—it may endure fatigue and hardship, or listlessness and inactivity—and it may, also, from a superabundance of nutriment, appropriate to itself sufficient to supply its wants and necessities, and reject the remainder. It would, therefore, be an exception to the general principle, a great and strange anomaly indeed, if the same laws should not apply, to a moderate extent, as well to alcohol as to all things else. We would not seek to advocate even the moderate use of intoxicating drinks, neither

would we consent that the grossest errors should be propagated through a mistaken zeal to promote the cause of temperance. Truth is so powerful that it will prevail, in all places, and under all circumstances, when it can be fully understood and duly appreciated; and when it is believed that error is used to accomplish even a good object, or compass a laudable end, the motive is not unfrequently doubted, and the truth itself rejected.

Calomel is another article for which there have been proposed innumerable substitutes; and in the whole Materia Medica, there is not another against which there is arrayed such an universal, deeply rooted and invincible prejudice. The general dislike of people to mercury, in all its forms, is no doubt grounded on sufficient reasons; they know its power and dread it, for they have seen, for themselves, frequent instances of its mischief when it has been incautiously or ignorantly administered. And, doubtless, members of the profession have found it for their interest to strengthen and perpetuate those popular prejudices, instead of directing or giving a more correct tone to public sentiment on a subject that so intimately concerns the community. And physicians to advance themselves in the favor of their patients, have even been so hypocritical as to flatter their prejudice against any mercurial preparation, where it has been already so strong that they have been compelled to resort to fraud and deception to cause it to be administered. We have known a medical man condemn mercury as the worst of all things, in the presence of his patient, and his patient's friends—and in two days the same individual was unceremoniously dismissed, for having unexpectedly

induced a profuse salivation in his patient after a long and unwarrantable administration of Calomel. This subject might be extended to an indefinite length; and, indeed, the consideration of popular objections to the different articles of medicine would be a pleasant theme to engage the attention, besides affording a wide field for investigating the causes to which they owe their origin.

By exclusiveness in medicine, there is shown a want of that which should peculiarly characterize every individual of our profession—viz. philosophy; which would impel every professed inquirer after truth, impartially and honestly to weigh testimony, and form his judgment accordingly. We may now with profit consider some of the causes which tend to the production of the discrepancies, ultraism, and exclusiveness in medical opinions, theories, and practice, to which we have briefly alluded.

Want of Education. To any one extensively acquainted with the medical profession in this country, it cannot fail to be clearly manifest that there is a general lack, as well of preparatory, as of more classical, and scientific education. The members of the profession are not altogether to blame for this, nor are they quite excusable. We must attribute it, in a great measure, to the compensation for medical services, which from various causes, are too small to afford the hope of remuneration to students, for being at great expense for an academical or professional education. But small as the compensation is, there are yet multitudes who enter the lists as competitors for the small fee, the scanty pittance, which they can ever expect for their services—and we verily doubt whether the actual fear of starvation

would deter such from longing after the honors which they believe to rest on the shoulders of a doctor.

Many are influenced to enter the profession from the great facilities, pecuniary as well as others, of acquiring a diploma, or license to practice ; little, in truth, being required, under some circumstances, besides a superficial smattering of the rudiments of the profession, and that at an astonishingly cheap rate. How often is it that one, who has failed to succeed, or who may have saved means sufficient, in some other occupation, has in three or four short years, without being blessed with talents above mediocrity, come out a full-grown, thorough-bred M. D. He may, to be sure, have passed through a regular course of medical study, attended lectures, and *paid for his diploma*—and, yet, a little knowledge of medicine is all to which he can lay claim, without being able to put a sentence together agreeably to the rules of orthography, etymology, syntax, or prosody. Many students graduate with "signal and distinguished honors," who have seldom taken a dissecting knife into their hand, or who have often seen it used in the hands of another, and go forth to assume the responsibilities of their profession ; and even to sport with the limbs and lives of their fellow men. Not trained to habits of study—entering the profession as a last resort—and often then, compelled to employ their time in other ways to obtain a livelihood—it is not surprising that the science of medicine should, from their hands, receive little or no cultivation—that their opinions should be formed with the least expense of purse, or labor of mind, and that their practice should be

of a character to correspond—an exclusive, empirical, routine.

It is the peculiar excellence of our government, and our pride and boast, that all who live under it are equal, in point of privilege, and in respect to person. "Liberty and equality," "democracy, and republicanism," are the watchwords of the day, and on these foundations thank Heaven, our institutions are reared; but there is a limit beyond which liberty degenerates into licentiousness, and when democracy is but another name for the rule, or rather misrule, of the rabble. It is not patriotism, or love to our fellow men, which would confer the same privileges on the learned and on the ignorant—on the virtuous and on the vicious—it is not republicanism which would lower the standard of the professions, and open the portals of science for all to enter, whether qualified or not. Instead of lengthening the term of study, or requiring more qualifications of a candidate for graduation, a cry of "aristocracy" is at once raised—the poor cry, "persecution;" they conceive their rights invaded, and an effort is made to produce a generation of doctors, of a character inferior to all their predecessors.

It is a fact that wealth always does, and ever will, confer power; in commerce, agriculture, manufactures, trade and speculation, capital is necessary. Those who have it not find no fault with those who possess it, because they see that none of these operations can be carried on without it. But, talk of matters of science, and the necessity of capital—of the expenditure of time and money to aid in its acquisitions—and the cry is, by those in and out of the profession, "that will never do,

it costs too much already to learn to be a doctor; you must bring the professions within our reach; let the man of three years' superficial reading enjoy all the honors and privileges of one who has devoted ten times the amount of labor to the same object; you must in fact degrade science to suit our circumstances, and our convenience—this is pure "democracy," this is "equality and republicanism." The facilities for acquiring a medical education cannot be put equally within the reach of all. To obtain a competent knowledge of the profession, time and money are both indispensably requisite. The first of these is in a great measure supplied, or provided for, by its *annihilation*, or by the short time of study required of a candidate for a degree; the second is made less necessary by rendering only the *quid pro quo*, by giving knowledge equivalent to the worth of the money only—by making up in *parchment* what ought to be conveyed in some other form.

Many who now occupy the first rank in our profession in this country have indeed risen from poverty and obscurity, and attained their eminence by their own unaided efforts. And men of genius, enterprise, and industry, will always rise, and rise above the bare qualifications for an entrance into their profession. The commencement of practice is their starting point in study; while a majority of those who make the greatest noise about "equal rights," and "rich and poor," consider the goal at that time already attained—their work done, for they have their M. D.—there is no more for them to learn, and the profession must be degraded—must be brought below par, for their special accommodation. We assert,

though we do it in sorrow, and without fear of contradiction, that the medical profession in our country is becoming more and more prostituted, compared with the general spread and increase of knowledge in the community, and its *honors* more common, and more easily acquired.

The inability of people to compensate a physician for his services, so that he shall be reimbursed for an expensive education, may, in part, excuse his ignorance; but nothing should be considered a palliation for indolence or neglect to devote himself to the interest of his patients, by cultivating a thorough acquaintance with his profession.

Wrong Education. What is equivalent to a lack of education, or what virtually amounts to the same thing, is a wrong direction not unfrequently given to the studies of a medical student. His preceptor has already his own mind fixed; his opinions are formed, not to be changed by improvements and discoveries, and he swears in the dicta of some celebrated master; he can therefore train his pupil to tread only in his own footsteps, and teach him, by rote, his infallible precepts; while the language of the pupil is, "lead on master, and I will follow, to the last gasp, with truth and loyalty." Thus error is perpetuated, and the mind, which was at one time clear and equally ready to receive truth as falsehood, becomes obscured and clouded, and the rays of a true philosophy are never able to penetrate the gloom and mist in which it is enveloped. In the hands of no class of men is a little learning or *bad* learning so dangerous as when possessed by physicians; they are then like the maniac who madly discharges a blunderbuss at a crowd—some *must* fall by his madness.

One principal cause which tends to the production, and perpetuation of error, and exclusiveness in medicine, is the prejudice of the teacher in favor of fixed and established habits and modes of practice. The vulgar saying that "it is hard to learn old dogs new tricks," is most conspicuously manifest—the opinions of the older class of practitioners being in general as unalterably established as the laws of the Medes and Persians. By a change of sentiment they virtually acknowledge their fallibility—that they have been wrong—that their practice has consequently been wrong—and that therefore, doubtless, they have done mischief; a concession which human nature is not over ready to make. By a change of opinion other concessions no more readily granted than the preceding, are also implied—so that the mind clings to its previous conclusions, although convinced that they may be wrong, rather than appear to be unstable and vacillating, by embracing a truth which must produce a revolution in sentiment—or in practice. "What," says the veteran in the healing art, "am I wrong—have I been wrong all my life? No! it is impossible." Old errors are more fondly cherished, and more easily propagated, than newly discovered truths. Thus, then, it is to teachers, either public or private, that medical students are indebted, in the first place, for what they know either right or wrong in our profession; and many of our errors we owe to their obstinately and blindly yielding to the influence of their own prejudices.

Want of Success. It is too frequently the case that a general principle, or a particular opinion is formed from insufficient grounds, by which a man is governed through

the whole course of his professional life. From a few isolated applications or trials of a remedy—no matter what were the circumstances which might modify its administration, whether or not the doctor, from his lack of education, might be capable of appreciating them—conclusions have been formed as to its efficacy; and upon such trials has its future destiny depended. A knowledge of the operations of the human machine, and their modifications in disease, is indispensable to one who would timely, and judiciously apply his remedies; how then can it be possible for him who has hurriedly, and by stealth, obtained a place in the ranks of the profession, to decide with any justice on the merits of a remedy, or even to prescribe it with any reasonable hope of success? It is such that become exclusive and empirical in their theories and practice—it is in such hands that remedies are extolled beyond their deserts, or unjustly depreciated; others, perhaps, echo the sentence—the non-professional public join in chorus, and the judgment is confirmed. Such is the fact in relation to one side of the subject, and the same thing occurs in regard to the other, while each party maintains its ground—hence the discrepancies, quarrels, and contests for victory.

The fault attributed to remedies is more frequently due to an inaccurate diagnosis; misconception, ignorance, and exclusiveness, fathering their sins upon an innocent, inoffensive, and at the same time, useful, agent. From improperly prescribing a remedy, and doing mischief with it at one time, the most learned and eminent are ever afterwards deterred from its employment, and rendered ardent in their zeal to depreciate it in the estima-

tion of others. As an illustration of this, we can now call to mind the case of one of the most eminent men in our profession in this country, who stated to the author of this work, that he positively knew that he had done fatal mischief in two or three instances with a particular article—and that he could no longer use it himself, or recommend it to others. Others, equally eminent, have not been thus unfortunate with the same remedy, and are as warm in its praise as he is in its condemnation; indeed, the article in question is used almost daily by us, and by almost every regular practitioner, without being followed by any unpleasant result. It may be left now to the decision of any candid mind whether, in this case, the medicine or the doctor was most in fault.

Early Prejudice. It is not alone the prejudice of those who have already entered the profession that tends to error and exclusiveness, but also the prejudice of the same individuals imbibed at an early age. Almost every one in his more youthful days has experienced to a greater or less extent, the pains of disease; and he too well remembers the nauseous, unpleasant taste and effect of the medicine he was thus compelled to swallow. To some it would, perhaps, at first, seem incredible and absurd, that these early likes and dislikes should influence the practice of a learned doctor, through the whole course of a long professional life. But such, nevertheless, is the fact. Impressions, no matter of what sort, made in early life, are the most enduring; and it is indeed wonderful how the medical treatment of a *sick boy* will control the prescriptions of the venerable, and gray headed doctor, long—long after he shall have ceased to recognize, or

perhaps, without once having suspected its influence. Again, the young inherit the opinions of their parents and those who have an influence in forming their minds; they catch the popular sentiment, and without the exercise of due philosophy or reason, it grows with their growth and strengthens with their strength. There is a medical gentleman of the writer's acquaintance, who, in his childhood, was obliged by his physician to take frequently, emetics. He became so susceptible to their operation that, at length, the sight alone of the remedy was sufficient to excite vomiting. His prejudice against the whole class of emetics has remained invincible to this day, although his better judgment, according to his own confession, tells him that his patients occasionally suffer in consequence. Such is the mind of man; yielding a more willing obedience to the influence of the feelings or the fancy, than to the convictions of reason.

Passions. It not unfrequently happens, even in an honest inquiry after truth, and in an effort to do good, that the human passions are allowed to influence our judgment and actions. The ties of kindred will lead a man to form conclusions contrary to the dictates of reason. And the *dicta* of a favorite author, or a respected, highly esteemed friend are taken for granted, without examination or without suspicion. One mounts his hobby, and another mounts and rides behind him. But as there happens to be none too much of the kind, holy, feeling of friendship in our profession, we must seek for another cause which places the members of the faculty in the relation of antipodes to each other. This is to be found in the envy, jealousy, and ill will of different writers and

practitioners. The heart of one is pained to see his brother wear the palm of merit, and in a paroxysm of spleen, he snatches at the wreath that encircles his brow.

No class of men, probably, however inconsistent it may seem with their profession, exhibit more of the frailties of our nature than physicians. Like the Divine physician they go about aiming to do good by healing the sick, binding up the broken hearted, and carrying comfort and happiness to the distressed and miserable. And while they are performing their almost divine errand, how their glory becomes dim by yielding to the impulse of those passions which counteract the most holy object. Any one, acquainted with the profession at home and abroad, may call to mind the names of those who lay claim to a large share of honesty and professional eminence, who, at the expense of truth, and at no less a sacrifice than the lives of their fellow men, would gladly, and with alacrity, degrade their brethren from a just elevation, if it would, even in a small degree, contribute to their own advancement. Nay, more—they would, like the hyena, pursue their prey to the tomb, and with a sacrilegious hand steal the wreath from a dead man's brow, and place it on their own. To such extent are the feelings of hostility carried in the practice of medicine, that one physician will not even use the remedies recommended by one whom he dislikes, when his own reason and conscience, besides his observation and experience, tell, and demonstrate to, him that they are the best adapted in a given case. We could, were it expedient, cite more instances than one, where a writer has warmly praised one plan of treatment for a certain disease, and

extolled particular remedies; and when he finds that one whom he dislikes, or whom he considers his mortal enemy, has done the same thing, he has changed his notes of praise into tones of the most bitter denunciation. Thus it seems that enemies, or rivals, cannot look with complacency on the same object—what one likes the other is certain to hate, and to malign—and the truth is not believed, because he who speaks it is not a favorite, or a friend.

Avarice. A hankering after dollars and cents—the *auri sacra fames*—has no small share in causing and entailing exclusiveness and ultraism in medicine. To avarice may be traced much of the quackery—many of the contemptible practices—the low devices—the art—cunning—and intrigue, that disgrace the profession. And although its operation may be more indirect and less perceptible than that of most other causes, it is none the less efficient. There are, and we are proud and happy to say it, but few comparatively in the medical ranks, who would through love of money pursue a course that would be deemed disreputable, or who would purchase wealth at the expense of honor. While our profession ranks high, as a body, for benevolence, and disinterestedness, and good will to man, there are yet those among us who esteem wealth more highly than reputation; and it is they who most readily embrace new doctrines, and new notions; such as catch the popular fancy, and give to the doctrines, and to themselves, an ephemeral reputation. It is to such characters that new and exclusive speculations are mainly indebted for their short-lived popularity, no matter how ridiculous, or how

absurd they may be—and when the gloss of novelty becomes dim, they are as ready to adopt another new creed, provided it bids fair to take with the people, as they were to embrace those of an opposite character which they have already forsaken. Not honest enough to confess and abandon their mistakes, when they are perceived and known, they persist in imposing upon the credulity of those who are ignorant or blind enough to repose confidence in their heartless, hollow pretensions.

A love of money alone, of all motives that induce an individual to practice the art of healing, is the most contemptible, mean, and disgraceful. He who deals out his advice, and measures his services, in proportion to the fee that he expects to receive, should more correctly estimate his own deserts than to claim a rank with the more honorable members of a liberal profession. The line where we should claim a compensation for our services, and where we should cease to do so, is not in all cases easily drawn; but it may be left with safety to a man's own conscience, which does not generally err to a great extent; and when, therefore, he begins to feel his "*honor grip*" he should be careful to look for no excuses to silence the monitor within.

Ambition, when its end is laudable,—when its aim is to advance the interest of the profession, and the good of mankind—may be tolerated; but when, regardless of all other considerations, it aspires to personal aggrandizement, its effects are as pernicious in the scientific, as they are in the political, world. To honest ambition, to a sincere desire to excel in a professional life by doing good, by being serviceable to our fellow men, are we in-

debted for most of the improvements and useful discoveries in medical science. But however honest the intention, or however pure the motive with which we set out, when we come to estimate our labors and investigations by the rules of loss and gain alone—whether in a pecuniary view, or with an eye to fame—the original enterprise is lost sight of and forgotten. Though physicians are philosophers, or claim to be, they are but men, and subject to the influence of all the passions that are inherent to our nature; self interest must therefore, philosophy to the contrary notwithstanding, more or less occupy their thoughts, and govern their actions, to the exclusion of the welfare of those around them.

The onward progress of our profession is, doubtless, greatly retarded by the eccentric wanderings of its followers. They deviate into unknown paths, captivated with the flowery fields that fancy pictures to their view, and confuse and bewilder themselves and their associates by the reports of their pretended newly discovered countries. Starting fresh in the contest, and filled with the most delightful anticipations, it is the young and enterprising who are most ardent in the pursuit of novelties—who are most eager in the desire of making brilliant and astonishing discoveries—and it is the younger members of the profession who are most apt to be led astray, and, as far as their influence extends, most likely to lead others with them. The many, and unexpected, difficulties to be encountered in acquiring a professional reputation, and a lucrative practice, stimulate the multitude of competitors to adopt those means, with little regard to their character or tendency, which are most

likely to accomplish the desired end; and we need not therefore wonder that such men ride their hobbies into error and ultraism.

The word of an ambitious professional man—one who is eager for distinction, and desirous of making a noise in the world, without a corresponding wish to advance the interest of science—should be taken, if received at all, at a most liberal discount; he is in the position of a witness in a court of justice, who is interested in the issue of a suit—and who, in the eye of the law, is deemed incapable of speaking the truth. Their intention may not be to misrepresent, or deceive; but the infirmities of our nature, the passions, self-interest, perverted judgment, or excess of zeal, may hurry them far beyond the bounds of veracity.

Gladly would we throw the mantle of charity over the faults of *all* our brethren, and excuse them on the ground of good intentions; but candor, and the honor, and good, of our profession forbid it. We, of the medical profession, are not a perfect race of beings; and there are those among us who are determined to rise, though in their ascent they sacrifice honor and honesty on the altar of their ambitious views, and trample under foot the hard earned reputation of past, present, and future generations—they will build a temple to their own fame, though it be based on falsehood, and reared amid the ruins of truth. Like the descendants of Ishmael, their hand is against every man—they lay waste and destroy to the extent of their power, and, with fiendish delight, survey the mischief which they accomplish. If we look for the effect of a restless, ambitious spirit, we shall

nowhere see it more manifest than in a densely populated place, where a number of physicians are brought into the same neighborhood. Here, in the proverbial quarrels between doctors, and the no less bitter disputes and misunderstanding of their friends, it works its own perfect work—it bears its peculiar fruit.

Listlessness, *carelessness*, and *indifference* to the welfare of our profession, are too often witnessed among its members. This state of mind is the chilling frost which destroys all action, and freezes the soul against the benevolent and kind affections which should warm us into efforts to do good to our fellow men, by advancing the character of the profession which we have espoused. When we relax our industry, and cease to cultivate and cherish our profession, we are like a man who abandons the wife of his bosom, and proves recreant to all the principles that adorn our nature—we are like an unnatural parent who forsakes his offspring, leaving it to the cold protection of strangers—or a child who deserts an aged, needy parent. There are those among the disciples of Esculapius who seem to imagine that the degree of M. D. is the sole end and aim of a medical student, and, when that is once obtained, nothing more need be done; their parchment they consider a passport to the confidence of the community, and their ulterior study is how to accumulate the most wealth in the shortest space of time, or how they may lead an easy, professional life, free from the labor of thought and reflection. They who are not by nature fond of study, and by habit trained to it, almost invariably run into a routine—exclusive—and empirical, doctrine and practice.

They are disinclined to the labor of reading and reflection, and condemn any practice with which they are not already familiar; and therefore, confine their prescriptions within the narrowest possible range. Doubtless, the trouble of thinking, or incapacity to think, drives more into quackery than any other cause. There are some strong minds, capable of grasping large subjects, and which seem unable to readily enter into the minutiae of the practice of medicine—they cannot nicely consider the characters of a disease—the peculiarities of constitution, temperament, season, and all the other circumstances by which it may be modified—and accurately weigh the properties and qualities of the different remedies, and then wisely and correctly choose those most appropriate to the case. It may be that a great mind cannot stoop to the consideration of such small items; or, through indolence and indifference, that it *will* not—but, till it both *can* and *does*, the possessor of it is not qualified to practice that profession of which he claims to be one of the most learned and honorable members. Such a mind adopts some favorite theory, and obstinately adheres to it, be the consequences what they may; and if an individual, thus mentally constructed, is by any circumstances, placed where he sways a commanding influence, the result of his favorite doctrine, or his indolence and indifference, cannot fail to be hostile to the progress of improvement.

Other pursuits and occupations not unfrequently entice the medical man from his profession. Some are compelled to engage in other business to increase their income—some embark in speculations to gather to them-

selves great wealth—and others, whose fortune is ample, devote themselves to pleasure and amusement. Be the occupation what it may, or whatever the reason that may lead to it, the result is very nearly the same; the profession is neglected—much is forgotten—and the improvements and discoveries made by others little noticed, or perhaps never heard of. Such men remain stationary or retrograde in their profession, while that is making rapid advances; so that in a few years they find themselves and their juniors separated at a great distance in scientific acquirements, and literary attainments, and their exclusiveness, and obstinacy, and comparative ignorance, are generally in the proportion that they have neglected their profession. To this quarter we may doubtless look for one of the causes which produce the mutual jealousy between the old and young members of the profession. The young practitioner knows that the veteran has, for some reason not perhaps the most creditable, neglected to keep up his acquaintance with the improvements in medicine, and therefore feels himself at least his equal; while, on the other hand, he who has grown gray in the practice of the healing art is conscious of his negligence, though he endeavors to offset his experience against improvements and discoveries to which he is a stranger. He, whose head is silvered with age, is, *caeteris paribus*, more likely to have acquired a greater share of science than a young man of twenty-five—but gray hairs alone, though entitled to respect under all circumstances, are far from being a test of profound knowledge, or professional skill. It seems that the term *experience* is often understood to mean *infallibility*, and is synonymous

with it—and the common idea is that it is impossible for an old doctor to be mistaken. But there unhappily is such a thing as experience in error; and persistence in erroneous practice can never make it right—an error repeated the five hundredth time is just as much an error as when at first committed. Whoever, therefore, ceases, from any cause, to cultivate his profession with diligence, even for a few years, may with truth, honesty, and justice, place himself—where others certainly will—in the scale of merit below his well read juniors, though his head should be whitened by the frosts of more than half a century.

In being influenced, by the above causes, to adopt erroneous and exclusive principles, and consequently to pursue an empirical practice, there is shown a disregard, or want, of the true spirit of philosophy—that sun, which warms, animates, and enlightens, the medical world. To insist that a particular disease, or a certain class of diseases, are to be cured by the same remedies, is to assume that the human system is a simple machine, and what is rather anomalous, always affected in the same manner by *different* causes. Let the proposition be illustrated. A state of the digestive organs may be induced, termed dyspepsia, by sundry causes—to wit, excesses in both eating and drinking, cold, hunger, thirst, fatigue of body, mental disquiet, etc. and yet an exclusive —one who sees nothing in all this, but gastritis or subacute gastritis—prescribes nothing but his depletives and diluents; and the want of success in all cases, which must inevitably attend such practice, only confirms him in his theory, and stimulates him to further starvation and

depletion. Such a man sees only an object, at a great distance, which he is desirous of attaining; and with his eye steadily fixed upon that, he is blind to the intervening obstructions which encumber his path, or to the difficulties which render it impossible to pursue his course. A philosophic practitioner takes a more comprehensive view of what he is to encounter; he looks upon the human system as a complicated machine, whose healthy, as well as diseased, operations are to be known and appreciated only by the closest scrutiny; and he knows, too, that disorders of the nervous system may ensue which are not always of an inflammatory character, and not to be remedied by depletion.

If the lack of philosophy is not apparent in narrow-mindedness, and voluntarily circumscribing the field of mental vision, and intellectual labor, it must be more glaringly manifest when the mind is allowed to be swayed by prejudice or favoritism, or suffered to be affected by the mould and rust of indifference or indolence. The profession of medicine is based on the most benevolent and ennobling features that adorn our nature—those characteristics which liken us to that Divine Being, who was Himself a most successful practitioner of the healing art. Like Him too we should endeavor to do good to our fellow men; and as much as in us lies, divest ourselves of the gross passions and prejudices that obstruct our well aimed efforts, and pervert the judgment. True philosophy does not seek to acquire science for the sole benefit of individuals—to alone aggrandize, or render famous, the erudite; but it aims to advance the happiness and prosperity of the world—the whole family of man,

How contemptible then does a man seem, who is a member of a liberal and learned profession, professing himself the disciple of an art whose nature is divine, laboring to acquire wealth or fame at the sacrifice of truth—robbing others of the well-earned meed of merit—or refusing to listen to unimpeachable testimony. Still more insignificant and ridiculous does he appear, who would condemn and proscribe a remedy, or a course of treatment, on his own authority, which has received the sanction and approbation of multitudes of his equals, and superiors in talent, learning, and opportunities for experiment and observation. And another must appear in the same light, who would condemn all improvements, and regard them rather as innovations, because forsooth, he is incapable of giving them a just estimate.

There is yet another view to be taken of this subject. When a man voluntarily engages in any undertaking—when he adopts any occupation or profession—he virtually pledges himself—he impliedly makes a contract, to make the interest of the calling, which he of his own accord chooses, his own interest. The welfare of each is thus identical—one, and indivisible. A volunteer in military service is bound by his honor to watch over, protect, and promote the well being of the whole army. Its cause becomes his cause, its interest his interest. In the same light should a volunteer in the medical ranks consider himself, for the cases of the two are analogous; the medical man claims to be skilled in the healing art, and by implication, pledges himself to act no hypocritical part, and to merit the confidence of the community, by retaining and increasing his professional knowledge.

Again, the medical man knows on what condition the confidence of the public is bestowed. He knows it is because they believe him qualified to practice what he professes to understand, and that he will continue to understand it, by keeping pace in his knowledge with its improvements, and by endeavoring with diligence to promote its objects. There is then an implied contract between two parties; and it is a contract too, which should be held most sacred, and should be most inviolably observed, inasmuch as from the nature of the compact, it must depend for its fulfilment upon the *honor* alone of one of the contracting parties. But this is not all—the stake involved in the issue of the compact is no less than life itself. The man, who, for the paltry consideration of dollars and cents, forfeits his pledged word is stamped by common consent with eternal disgrace; and the soldier who deserts his country's standard has the brand of infamy indelibly engraved upon his character, if, perchance, he escape the ignominious death of a traitor or a coward. In what estimation the medical man shall be held, who neglects, and therefore dishonours, the profession from which he seeks to derive honor; who, in truth, deserts and disgraces the flag under which he claims protection, we leave to the candid to decide. Let us suppose an instance which is of frequent occurrence. A man is induced in case of violent disease to entrust the life of an only child, or a dear wife, to the hands of a doctor who has, by some means, acquired the confidence of the patient or his friends. The physician may be an aspiring, ambitious man, who is desirous of having his name in every person's mouth; or he may be of that class whose study it is to

acquire wealth; or one of a still more contemptible character—who is too lazy to sigh for applause, or thirst for money; the result may be anticipated—the patient is sacrificed to the doctor's failing to discharge the responsibility that he had voluntarily assumed. The sin of omission, or rather of ignorance, in such cases is not to be winked at. We believe that he who fails to do the "best that circumstance allows" is equally guilty in the sight of Heaven as one who knowingly and maliciously prescribes a remedy which he believes will prove fatal.

There is, therefore, wanting a sense of honor as well as responsibility and philosophy, in losing sight of the great end and aim of medical science, and allowing the mind to remain inactive, or to be influenced by fear, favor, an invincible love of money, or an overweening desire for popular applause.

The general effect in the community of the causes above named, aside from those fatal results which the grave conceals, is daily seen in the endless misunderstandings and quarrels among physicians; these are not confined to the faculty alone, but the friends of each of the principals buckle on their armour and rank themselves under their respective banners. Each one thinks his doctor the most learned, and therefore the best, and least fallible; the opinions of the respective principals are adopted and closely adhered to, and a medical war is carried on with the greatest vigor and animosity. Such, at least, is almost constantly the fact in country towns; and, while the same causes continue to operate, the same spirit is transmitted from one generation to another.

The final result to medical science of this state of

things is most unhappy; the profession is sadly impeded in its onward progress, if indeed it is not made to retrograde. The mind, occupied with any thing rather than a sincere desire to seek information for the sake of using it to the benefit of our species, loses all relish and capacity for scientific pursuits. One, whose thoughts are intently bent on making money, or supplanting his brother in popular esteem, or who is disposed to lead a life of inglorious ease, can do but little in advancing his profession to that proud eminence to which it justly aspires.

CHAPTER XVI.

OF THE INFLUENCE OF THE CLERGY IN CAUSING AND PERPETUATING EMPIRICISM.

The heading of this chapter may, at first, imply an unpardonable heresy on the part of the writer, or a want of due respect for the clerical profession; but, with all reverence for those whose concern is with our spiritual welfare, his object in this volume—which is to consider the chief causes of quackery, and the obstacles to the improvement of medical science—would not be fully accomplished were he to leave this part of the subject unnoticed. No one, who rightly appreciates the character of a minister can doubt his influence on any subject in which he takes an interest, whenever he chooses to exert it. This is as it should ever be, and as it always has been. Those who have eyes should lead the blind, but they should always guide their footsteps in a *right* path. The strong should sustain the weak, but not use their power to destroy them. The wise should instruct, counsel, and direct the less intelligent, but their lessons should always be those of truth and wisdom.

The position in community of the clergy, and more particularly of those who have in their charge a parish or distinct society, must of necessity give them a command-

ing, controlling, influence. The relation subsisting between a pastor and people is one of close intimacy, and when there is the mutual confidence that there ought to be, the connexion is strengthened by the strong bonds of friendship. The minister is admitted, second only to the family physician, to domestic secrets, and is made familiarly acquainted with all the avenues to the heart, and its inmost recesses. In the minister unlimited confidence is reposed. His profession is to do the work of one, "who went about doing good." In times of affliction and distress he is the friend and counsellor; and to him, when the heart is breaking with sorrow, we turn for sympathy and consolation. And is it surprizing that men thus esteemed, and thus confided in—men whose sole aim and occupation is to do good—should in matters not strictly professional, though with motives equally pure, exert a powerful influence? It is far from the author's intention to charge upon the clergy generally any obliquity of purpose for what they do in regard to medical affairs; for he believes them to be actuated by genuine piety, and the best intentions, although, unquestionably, there may be some family interest, or some selfish object to accomplish.

There are two ways in which clergymen are chiefly instrumental in the propagation and spread of empiricism; and there is yet another way in which they ought to contribute to its overthrow, and to the establishment of something better in its place.

The first way in which they aid and abet quackery is by furnishing certificates of the efficacy of nostrums, to

the inventors, or proprietors. Their certificates are furnished in good faith, and bear evidence only of the truth, with a sincere desire to benefit others by recommending the remedy to general use. They may indeed have been cured of some uncomfortable or dangerous disease; but, ignorant as the rest of the world of the nature of disease and the principles of physiology, they do not know that what *cures them* may *kill another* with a similar complaint. The certificate of a minister is considered, by a quack, as invaluable; and when two or three are procured from distinguished characters, they insure a great sale of the nostrum, and of course, a lucrative speculation to its inventor. When the clergy take the pills or potions of a quack, the laity have little hesitation in following their example; and whoever contributes to the extension of ignorance and error, or to their perpetuation, by obstructing the progress of science in fostering quackery by recommending secret remedies, does injustice to society, and to society he should be held responsible. If the remedy is one of power, it may do hurt; if simple, and lacking in potency, confidence may be reposed in it, when active treatment is necessary, till some fatal disease has made too great progress to be arrested. He who trusts to a secret remedy is like one who places his fortune and his life in the hands of a stranger—not knowing whether or not he may be murdered and robbed at the first favorable moment. A hearty, robust boy, six years old, was seized with an affection of the lungs attended with a violent cough. A minister who frequently visited the family

urged the parents to give him a certain syrup that he had known used in many cases "*exactly like this*" of course, and he believed the syrup to be a *certain cure*—like all other nostrums. The syrup was administered; the boy grew worse; the quantity was increased—and so was the disease; another bottle was used up—and so was the boy. A post mortem examination proved the disease to have been an acute inflammation of the lungs, which might, in all probability, have been cured by prompt, and efficient treatment.

The second manner in which the clergy aid in the production of quackery is by interfering with people in their choice of a family physician. This is a less direct but quite as effectual a method, as the other; and it not only contributes to the production of empiricism *out* of the profession, but also *in* it. But the mischief stops not here; feelings of ill-will, jealousy, and misunderstandings which lead to open quarrels between different members of the profession, and between patients and their friends, not unfrequently result from the unwise intermeddling of gentlemen whose profession teaches them better. Let us take an instance to illustrate the position. A member of a family in which a clergyman takes a deep interest is sick; they have their physician in whom they have the most implicit confidence, who has been for years their firm friend and most faithful servant, and to whom, perhaps, some one or more are indebted for their lives. The clergyman has his favorite doctor also, in whom he has confidence; he believes him to be superior in learning and skill to all others; and besides, he believes him to

be particularly skilful in the very disease with which the patient is afflicted. By the importunity of the minister, the physician in attendance is dismissed, and another is called in; and perhaps the patient dies in consequence of the change of treatment; for something different must be attempted for the sake of appearance, however judicious may have been the previous course; and then it may be said that the second physician was called too late. The minister's doctor may be an ignoramus compared with the other; and if, as is not unfrequently the case, he takes charge of the patient at a favorable moment, he receives the credit of a cure which of right belongs to another, and who has been dismissed in disgrace, and who is repaid for his kindness with black ingratitude. Here commence the quarrels and misunderstandings of all parties concerned, which the exercise of a small share of discretion would have prevented. The cause of all this wrong doing lies in the ignorance, not the motive, of the minister. And here the author begs leave to repeat, that he does not believe all ministers, or even a majority, are guilty of error in this respect; but there are some who are, and they will know when these remarks are applicable to themselves. When the author speaks of ignorance of the clergy, he means ignorance as regards matters pertaining to the medical profession; and however unpalatable it may be to gentlemen who are learned in theology, and who believe themselves to be beyond the reach of imposition, it is nevertheless a fact that the most perfect dupes of quackery, those who are loudest and longest in their praises of hobbies and humbugs, are

members of the clerical profession. The reasons for their being thus duped are to be found in their ignorance of the principles of medicine, the data upon which to form opinions—and their belief in the honesty of the designing and unprincipled charlatan. In all the interference of ministers with the practice of physicians they may be actuated by the best motives; but inasmuch as they are unacquainted with the physician whose dismissal they procure, they are unjust towards him. The question then arises, is it proper for a clergyman in any case to give his advice, or to recommend a change of physicians? Certainly it is. But before he insists that one shall be dismissed and another called, let him make himself acquainted with the merits of the first, and see if they do not at least equal those of the one whom he proposes as a substitute. He may at all times recommend a consultation; and to this no one concerned would object; and then if the attending physician is in error he will be most likely to be corrected. Or, if a medical attendant is found to be unworthy of confidence, after due investigation let him at once be notified that his services are no longer required.

From the position that the clergy occupy in society, and the necessary influence of that position, we have a right to expect, that they will exert all their influence for good. One means of doing good would be to make themselves acquainted with the human system, to a greater or less extent, and the laws which govern it, as well as the *principles* of physiology and therapeutics. They would, thus, be enabled to aid greatly in the eradi-

cation of prejudices from the minds of the populace, and the overthrow of quackery and imposture. A little attention to the temporal habitation of that spiritual existence, whose welfare it is their profession to seek, would prevent dissensions in the profession which are now the direct result of ill-timed, and injudicious, but well-meant advice to their friends.

END.